

Annual and Sustainability Report 2022



**More Lives Saved
– More Life Lived**

Autoliv

'22

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Forward-Looking Statements

Except for historical information, matters discussed in the annual report are forward-looking statements and are based on management's estimates, assumptions and projections. Actual results could vary materially. Please review the "Risk Factors" and "Management's Discussion and Analysis of Financial Condition and Results of Operations" sections in the Company's annual report on Form 10-K for the fiscal year ended December 31, 2022, and subsequent SEC filings, for factors that could affect the Company's performance and cause results to differ materially from management's expectations. The information in this report reflected management's estimates, assumptions and projections as of January 27, 2023. Autoliv has not made updates since then and makes no representation, express or implied, that the information is still current or complete. The Company is under no obligation to update any part of this document.

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Cover photo: Autoliv colleagues constantly challenge and redefine the standards of mobility safety to sustainably deliver leading solutions. Here, represented by Alexandru Moharta, Autoliv Steering Wheels Line Operator in Sfântu Gheorghe, Romania.

Location and Capabilities

Location ³⁾	Headcount	Tech center	Production				Sales support
			Airbags	Seat-belts	Steering wheels	Other ²⁾	
BRAZIL ¹⁾	925		●	●	●		●
CANADA	428					●	
CHINA ¹⁾	8,910	●	●	●	●	●	●
ESTONIA ¹⁾	1,033			●		●	
FRANCE	1,728	●	●		●	●	●
GERMANY	851	●					●
HUNGARY ¹⁾	1,845			●			
INDIA ¹⁾	3,238	●	●	●	●	●	●
INDONESIA ¹⁾	190			●	●		
ITALY	14						●
JAPAN	2,069	●	●	●	●	●	●
MALAYSIA ¹⁾			●	●	●		
MEXICO ¹⁾	15,427		●	●	●	●	
NETHERLANDS	7						
PHILIPPINES ¹⁾	1,528				●		
POLAND ¹⁾	2,467	●	●			●	
ROMANIA ¹⁾	10,473	●		●	●	●	●
SOUTH AFRICA ¹⁾	207		●	●			
SOUTH KOREA	464	●	●				●
SPAIN	426		●				●
SWEDEN	563	●				●	●
SWITZERLAND	8						●
THAILAND ¹⁾	4,084		●	●	●	●	
TUNISIA ¹⁾	4,243				●		
TURKEY ²⁾	2,955		●	●	●	●	●
UNITED KINGDOM	248					●	
USA	4,607	●	●			●	●

1) Defined as a best-cost country. 2) Includes weaving and sewing of textile cushions and seatbelt webbing, inflators, and components for airbag and seatbelt products. 3) Our operations in Russia are currently suspended.

The World's Largest Automotive Safety Supplier

Autoliv, Inc. (NYSE: ALV; Nasdaq Stockholm: ALIV.sdb) is the worldwide leader in automotive safety systems.

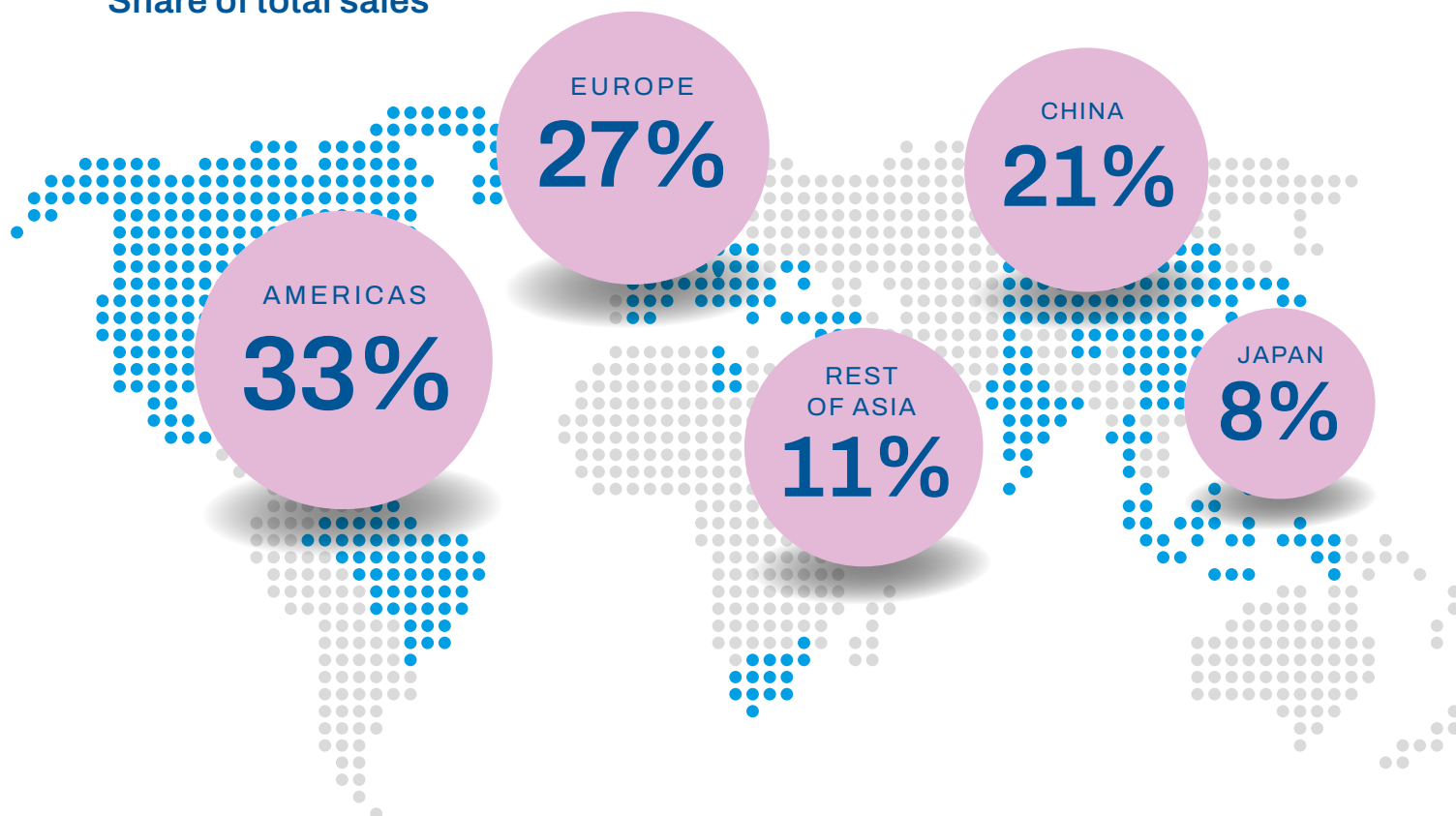
At Autoliv, we challenge and redefine the standards of mobility safety to sustainably deliver leading solutions. In 2022, our products saved close to 35,000 lives and reduced more than 450,000 injuries. Autoliv develops, manufactures, and supplies passive safety systems for the automotive industry as well as mobility safety solutions.

Passive safety systems are primarily meant to improve safety for occupants in a vehicle, and include modules and

components for frontal-impact airbag protection systems, side-impact airbag protection systems, seatbelts, steering wheels and inflator technologies.

To extend into new market areas beyond light vehicles and occupant safety, Autoliv has formed Mobility Safety Solutions (MSS). By combining our core competence and industry experience, MSS develops and manufactures mobility safety solutions such as pedestrian protection, battery cut-off switches, connected safety services and safety solutions for riders of powered two-wheelers.

Share of total sales



Key Figures 2022

\$8.8b

net sales

6.8%

adjusted* operating margin

54%

cash conversion*

\$713m

operating cash flow

14%

organic* sales growth

43%

market share

22%

improvement in Incident Rate

9%

renewable energy use

98%

direct material suppliers
sustainability audited

Associates **69,100** worldwide

Operations in **27** countries

Incorporated in **Delaware, United States**

Lives Saved **Close to 35,000**

Headquartered in **Stockholm, Sweden**

Tech Center Locations **14**

*) Non-U.S. GAAP Measure. See "Non-U.S. GAAP Performance Measures" section in the 10-k filed with the SEC.



Autoliv people challenge and redefine the standards of mobility safety to sustainably deliver leading solutions. Autoliv's leading safety solutions create the confidence to embrace the new horizons in mobility.

Well-positioned to Manage New Business Conditions



As the market leader, we are well-positioned to sustainably adapt to and manage new business conditions. Our actions have built an even more competitive position for Autoliv, despite a challenging macro environment. Commercial excellence, efficiency, cost control, and a focus on innovation, quality and climate action defined 2022.

Market development

We continued to strengthen our position as the market leader in 2022 through our strong sales growth and the profitability and cash flow performance, especially in the second half of the year.

2022 was marked by direct and indirect effects of the COVID-19 pandemic, particularly related to the lockdowns in China in the early part of the year and the country's reopening towards the end of the year. Component shortages (primarily for semiconductors), unstable supply chains, increased costs for raw materials, and significantly increased inflation all challenged the global economy and our industry.

The direct impact of the tragic war in Ukraine on our business has been relatively limited. Since the war began in February 2022, we suspended both our Russian operations and our presence in Russia. The indirect effects of the war include supply chain disruptions and significant energy price increases in Europe. My sympathies go to all of those affected by the war.

As a result of these challenges, part of the automotive industry continued to operate at, or near, recessionary levels. For example, due to supply constraints, European registrations in 2022 were approximately 30% lower than in 2009 during the financial crisis. The component shortages not only limited the industry output, they also created a situation with unpredictable and volatile light vehicle production (LVP) that substantially affected our operational efficiency.

During the year, we faced the worst cost inflation seen in three decades, which initially significantly impacted our profitability. Through price adjustments, we managed to gradually offset the raw material cost inflation and profitability was restored towards the end of the year.

The continued high level of product launches and relentless cost control were the foundation for our strong performance. Our performance was also supported by price adjustments that compensated for the high raw material cost inflation, which was a result of the extensive discussions we initiated early in the year with our customers.

In 2022 our sales grew organically* by 14%, outperforming LVP growth in all major regions, mainly due to pricing and product launches. Order win rates for new electrical vehicle (EV) platforms were high, both with new EV makers and traditional car manufacturers.

Quality and innovation – At the heart of what we do

Autoliv exists to Save More Lives. Our relentless focus on innovation and quality has made us a preferred partner and established our market-leading position.

While the automotive landscape is constantly changing, quality expectations are only increasing. This requires us to always focus on quality across the value chain, and as part of our product lifecycle management program, we are building a proactive end-to-end approach to achieve zero defects and reduce total non-quality cost.

Our innovation agenda supports our continued evolution to include safety for mobility and society, and our focus on key current industry technology and product development. We continue to develop our products based on real world data to ensure their benefit for our customers and the end user.

Autoliv's Mobility Safety Solutions (MSS) develops products and services for businesses adjacent to Autoliv's core areas of airbags, steering wheels, and seatbelts for light passenger vehicles. Such adjacent products and services include powered two-wheelers, connected safety services, and offerings to customers beyond passenger vehicle manufacturers.

A major focus area for us is new passive safety solutions driven by the evolution of global automotive market trends. Our development teams constantly challenge and redefine the standards of mobility safety to deliver solutions for future development such as autonomous cars and advanced driver-assistance systems.

Creating a positive societal and environmental impact

Sustainability is firmly rooted in our business and, as a market leader in our field, our efforts are aligned with society's broader agenda. We are committed to leading the way and being an active contributor to sustainable mobility and society. Our products save close to 35,000 lives and reduced more than 450,000 injuries every year. We want to do more, and our ambition is to save 100,000 lives per year. Our business contributes to the realization of several UN Sustainable Development Goals (SDGs), and we are a signatory of the UN Global Compact principles.

Autoliv is firmly committed to supporting the United Nations Road Safety Fund (UNRSF) and its mission to increase awareness and availability of life-saving products where they are most needed. Supporting the UNRSF is a way for Autoliv to share our expertise while gaining additional insights into the main road safety challenges facing the world today. Autoliv will contribute knowledge and experience regarding global traffic safety challenges. In 2022, Autoliv joined the UNSRF Advisory Board, whose objective is to provide strategic direction to the Fund.

We have a strong commitment to climate action. Back in June 2021, Autoliv became the first automotive safety supplier, a frontrunner among suppliers to the automotive industry, to commit to become carbon neutral in our own operations by 2030 and aim for net-zero emissions across the supply chain by 2040. In 2022, our detailed and ambitious climate targets were approved by the Science Based Targets initiative (SBTi).

To reach our ambitious science-based climate targets, we need to collaborate across the value chain. Autoliv will reduce its greenhouse gas emissions through the use of renewable electricity in our own and suppliers' operations, improve energy and materials efficiency, adopt low-carbon logistics and low-carbon materials, and develop attractive low-carbon product offerings to support our customers in their transformation to zero-emission vehicles.

We are well-positioned to continue to support our partners and customers in achieving their sustainability goals. Examples of our collaborations include the green steel collaboration with SSAB and our collaborations with Piaggio and POC that push the boundaries of safety to include vulnerable road users. Together, we are researching and developing technology aimed at finding climate-neutral solutions and innovations related to mobility safety.

Outstanding employee efforts

Autoliv employees are actively redefining the standards of mobility safety to sustainably deliver leading solutions. Inspired from the beginning by our vision of Saving More Lives, the 69,100 members of our global team are passionate about creating innovations and collaborations that best meet safety needs in both the current and new mobility.

During a year focused on managing new business conditions, I am proud to have witnessed the resilience of our colleagues and the commitment of our global Autoliv community when it comes to supporting those in need – affected by Typhoon Rai in the Philippines, COVID-19, and the tragic war in Ukraine. Through the strong engagement of our local teams, we maintained direct contact with our colleagues and provided support when it was needed.

We have a strong foundation that we continue to build on. In turbulent times, collaborative learning and sharing best practices allow us to become better and better. Autoliv Production System is our foundation for continuous improvement. I am convinced that we will continue to grow even stronger as we move beyond the challenges of the past few years.

“I am proud of what the Autoliv team has done and continues to achieve in a challenging environment.”

Going forward

We will continue to leverage our market-leading position to build an even more competitive position going forward. Customer focus, innovation, quality, efficiency, and cost control will continue to guide our path as Autoliv succeeds by creating value for our customers, our shareholders, and other stakeholders.

In 2023, Autoliv turns 70 years old. The Autoliv story began in 1953 when two brothers, Lennart and Stig Lindblad, founded a small automotive parts and service company in Vårgårda, Sweden, beginning a long tradition of a relentless focus on innovation, quality, and customer focus.

Autoliv's vision of Saving More Lives guides our work every day. Sustainability is an integral part of our business and a fundamental driver for market differentiation and stakeholder value creation, helping to ensure that our business will continue to thrive and contribute to sustainable development. This is our responsibility – to our shareholders, customers, business partners and employees. We welcome you to join us on our continuing journey.

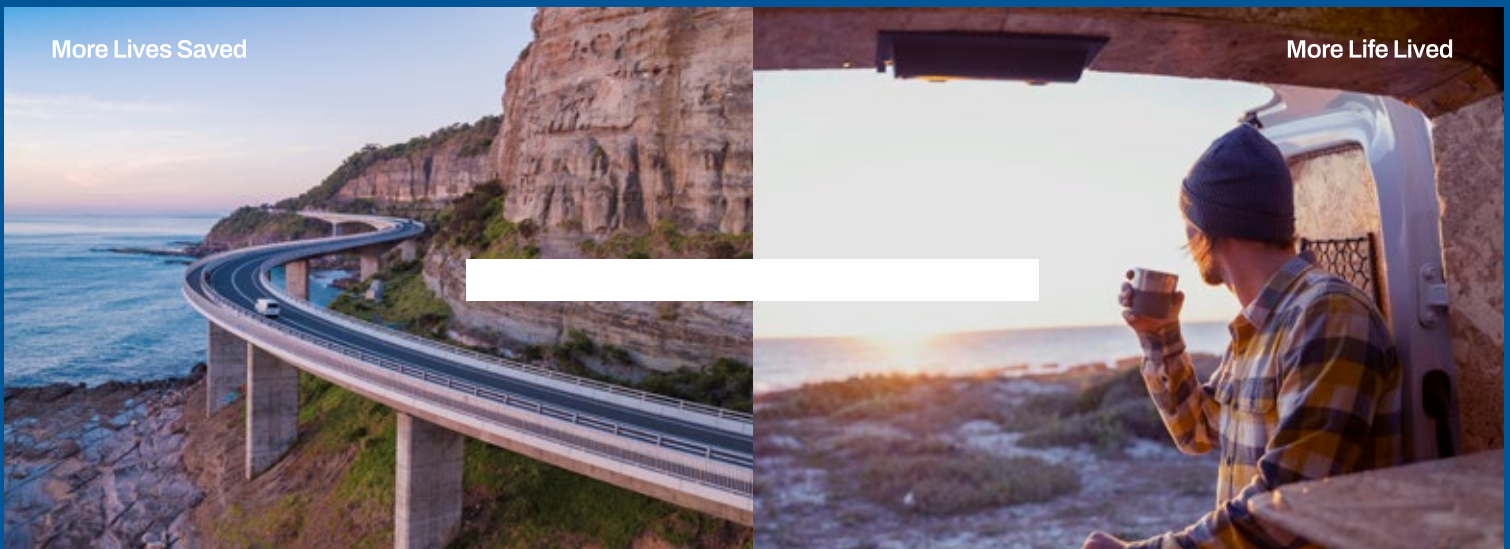
Mikael Bratt
President and CEO
Stockholm, February 2023

Our Vision

Saving More Lives

Our Mission

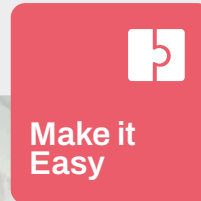
Providing World Class Life-Saving Solutions for Mobility and Society



More Lives Saved – More Life Lived

"More Lives Saved – More Life Lived" is anchored in our fundamental vision that has driven Autoliv's success to date: Saving More Lives. This concept connects all the innovation, technology, and quality standards inside Autoliv's business with what we know is very important to people outside our business: Staying safe when on the move so they have the confidence to live life to the fullest.

Our Key Behaviors



We are the market leader of our industry and what we do matters. This calls for a focused approach on our ways of working. Our Key Behaviors express the essence of our ways of working in a clear and consistent way.

The Autoliv Journey

We are proud that our products save close to 35,000 lives and reduce more than 450,000 injuries every year. As a safety company our products never get a second chance. Therefore, quality is always at the core of what we do.

2030

- Safety for Mobility & Society
 - Market Transformer
 - System Integration
 - One Team
- Carbon Neutral in Own Operations

2023

- Light Vehicle Safety
 - Market Leader
- Mechanical Components
- Functional & Divisional Execution
 - Energy Efficient

The journey explained

Guided by our vision, mission and key behaviors, the Autoliv journey from 2022 to 2030 will transition our business from light vehicle safety to safety for mobility and society.

By being more proactive and strategic with our customers and in the market in general, we will evolve from being the market leader, to an influencer and ultimately a market transformer.

In a world where cars are becoming computers on wheels, we must build on our mechanical component competence and grow electronics and mechatronics systems and systems Integration capabilities.

Driving efficiency requires an end-to-end approach where we become one global team executing on our prioritized transformation projects – product lifecycle management, commercial excellence and digitalization. Becoming a low-carbon energy user and reach climate neutrality by 2030, requires a coordinated approach.

This is a journey on a well-paved road to take us to our financial and sustainability targets. We know what to do and how to do it, supporting our vision of Saving More Lives.



2025

- Light & Commercial Vehicle Safety
- Market & Commercial Influencer
- Electronics & Mechatronics Systems
 - End-to-End Ways of Working
 - Low-Carbon Energy User

Continuous Improvement

Our ability to consistently outperform market growth is rooted in a steady flow of new safety technologies, a strong focus on quality and a superior production and engineering footprint.

Our roadmap to leverage growth into higher profitability

In the medium term, we intend to continue to grow our core business – airbags, seatbelts and steering wheels – through successful execution of the current product launch programs and strong order book. To maintain growth momentum beyond the ongoing step change, we are pursuing an ambitious innovation program which includes targeting several “world firsts”.

Successful organic growth will also rely on driving operational excellence while providing superior quality to our customers in terms of product performance and delivery reliability prior to and after the start of serial production. We are also investing in capabilities beyond the light vehicle markets, which we organize in Mobility Safety Solutions.

Continuous improvement remains a cornerstone of Autoliv’s ongoing efforts to leverage growth into higher profitability. The Autoliv Production System enables us to pursue a broad agenda of continuous improvement activities across all functions including sales, operations, supply chain and support functions. To accelerate our margin expansion journey, we invest in automation and digitalization of our core business and support processes and execute end-to-end value chain improvement programs.

Financial and Sustainability Targets

Our strategic roadmap, business priorities and targets are deeply rooted in the growing demand for traffic safety and a strong belief that the need for our products will continue to grow.

To enhance shareholder value, we focus on growth, both near-term and long-term, profitability improvement and over-the-cycle resilience, cash flow generation for shareholder returns, a strong balance sheet and prudent leverage policy.

We have set short- and long-term sustainability targets in the key areas to make sure we maximize our positive impacts and manage our negative impacts.

Autoliv Key Targets: Growth Drivers		Autoliv Key Targets & Ambition: Profitability Drivers	
2022-2024	Average annual organic growth* LVP+~4% excluding price compensations <ul style="list-style-type: none"> Market share gains Content per vehicle 	Medium-Term	Adjusted operating margin ¹ target ~12% <ul style="list-style-type: none"> Stabilized light vehicle production >85 million Net negative impact from inflation not greater than in 2021 Strategic initiatives
Long-Term (beyond 2024)	Average annual organic growth* 4-6% <ul style="list-style-type: none"> Content per Vehicle Mobility Safety Solutions Light Vehicle Production 	Long-Term	Adjusted operating margin ¹ ambition ~13% <ul style="list-style-type: none"> Strategic initiatives Stability in market conditions

Focus Area	Key Targets and Ambitions				
Saving More Lives	100,000 Lives saved per year				
A Safe and Inclusive Workplace	0.35 Incident Rate by 2023	3.8 Severity Rate by 2023	95% of senior and mid-level management trained in unconscious bias by 2023	Year-on-year improvement in Employee experience	22% women in senior management by 2023
Climate Action	Carbon neutrality in own operations by 2030	Net-zero emissions across our supply chain by 2040	12% reduction in energy intensity by 2023	Year-on-year reduction in waste Continuous	
Responsible Business	100% in target group completed anti-corruption training Continuous	100% in target group completed anti-trust training Continuous	100% in target group Code of Conduct certified Continuous	100% direct material suppliers sustainability audited by 2022	100% direct material suppliers respond to conflict minerals survey Continuous

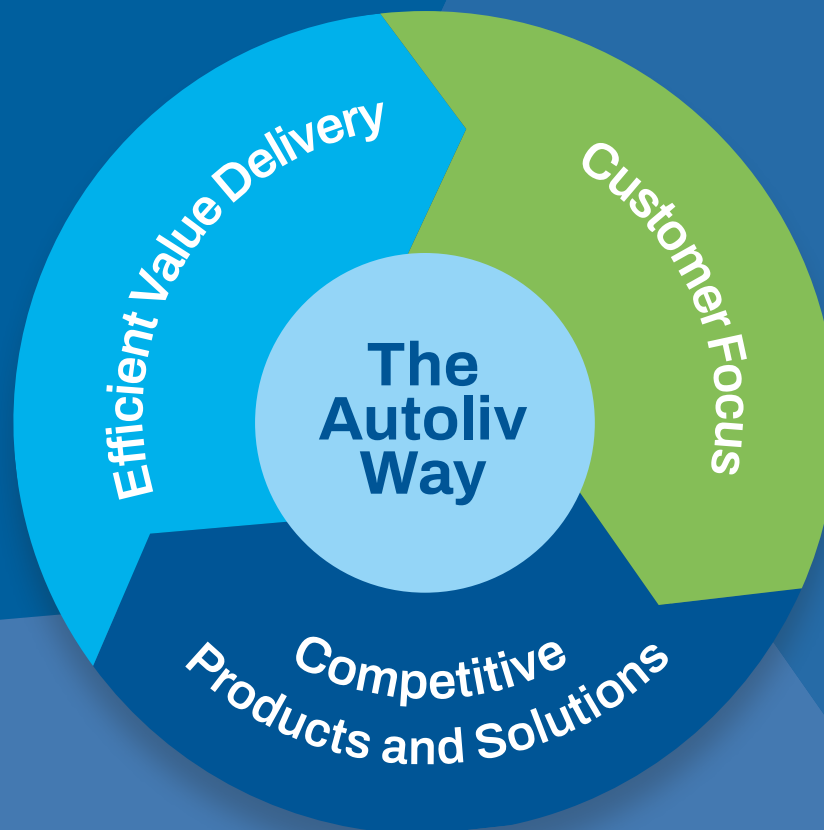
1) Non-US GAAP measure. Excluding costs for capacity alignments.

Strategic Framework

The Strategic Framework is made up of four elements that directly support our financial and sustainability objectives and targets. The implementation of our Strategic Framework is driven by our Policy Deployment program.

PROFITABLE
& CAPITAL
EFFICIENT...

...GROWTH





THE WHO

Customer Focus

- We create value for the customer by creating a fit between the customer need and the product or solution we sell
- Customer Focus at Autoliv is about identifying the customer dimension of the customer-product fit, the customers we need to work with to meet our targets, and their needs



THE WHAT

Competitive Products and Solutions

- We complete the customer-product fit by developing competitive products and solutions to meet the identified customer needs
- We deliver on our product and solution profitability targets along the full product lifecycle by creating efficient processes and actively managing our portfolio



THE WHERE

Efficient Value Delivery

- We align our value chain to ensure value is delivered to our customers at the right time, in the right place, at the right cost and with the right capital intensity



THE HOW

The Autoliv Way

- The Autoliv Way gives us a common view of what great looks like at Autoliv and how we get there. It is about establishing common ways of working to deliver on Autoliv's vision of Saving More Lives
- For the 2023-2025 Strategy Cycle, we have identified a selection of focus areas that require everyone's commitment in order to realize our strategy and meet our targets

2022 Summary



We ended the year with strong profitability and cash flow, after managing to offset significant market challenges, especially industry-wide raw material cost increases and component shortages which lead to a volatile and unpredictable LVP.

The full year 2022 was an important step towards our medium-term targets. We continued to strengthen our position as the market leader through our strong sales growth and the solid profitability and cash flow performance in the second half of the year.

In 2022, we faced the worst cost inflation seen in three decades, which initially significantly impacted our profitability. Through substantial price adjustments, we managed to gradually offset this raw material cost inflation, and profitability was restored towards the end of the year.

Despite continued strong end-consumer demand for new vehicles, global light vehicle production (LVP) did not recover to its pre-pandemic level. This was mainly a result of an industry wide shortage of semi-conductors and a distressed global automotive supply chain. The shortages also resulted in late changes to call-offs with short notice as global car manufacturers (OEMs) managed their output to match availability of components. This negatively impacted our production efficiency and profitability.

Our sales increased organically* by 14%, outperforming global LVP by 6.6 percentage points. This was the fifth consecutive year that we outperformed global LVP by 5 to 7

percentage points, driven by price increases, increased market shares and higher safety content per vehicle. Our adjusted operating margin* improved from 3.2% in the first quarter to 10.0% in the fourth quarter, as a result of successful negotiations regarding cost compensation and our strong focus on continuous improvements throughout the organization. For the full year the adjusted operating margin* was 6.8%. Our cost control measures in 2022 included footprint and capacity alignment in Europe and footprint adjustments in Japan and in South Korea.

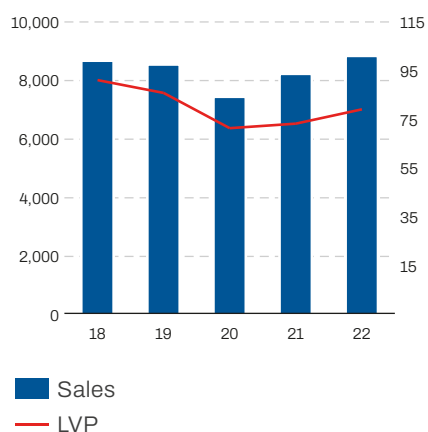
Operating cash flow declined slightly from prior year, to \$713 million, mainly due to inventory inefficiencies as result of the volatile LVP. Free cash flow amounted to \$228 million, down \$72 million from 2021. Capex, net in relation to sales was 5.5%, and cash conversion was around 54%.

In 2022 we paid \$2.58 per share in dividends, an increase of around 37% from 2021, and repurchased and retired 1.44 million shares. Additionally, we retired 10 million of our treasury shares from previous stock repurchase programs.

In 2022, the GHG emissions intensity of our operations improved by 9% compared to 2021, driven largely by a significant increase in the use of renewable energy.

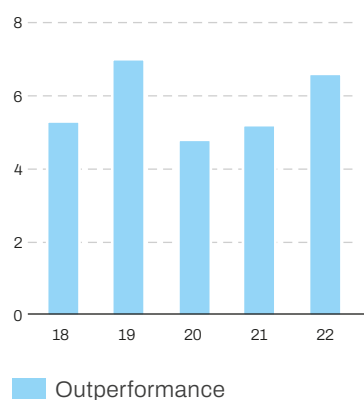
Sales and global LVP

US\$ (Millions) and Units (Millions)



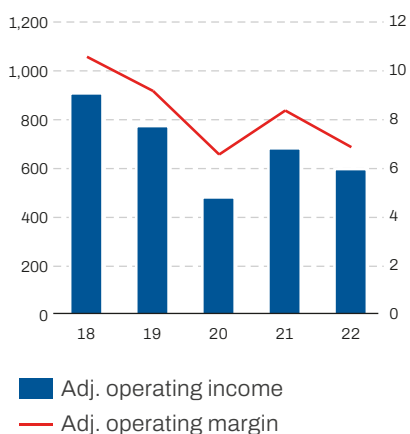
Organic sales vs. LVP change

Percentage Points



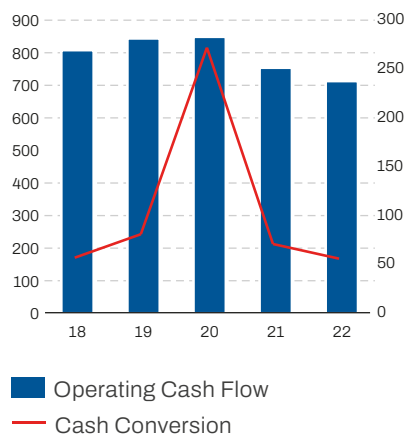
Adjusted operating profit & margin

US\$ (Millions) and in relation to sales %



Operating cash flow & cash conversion¹⁾

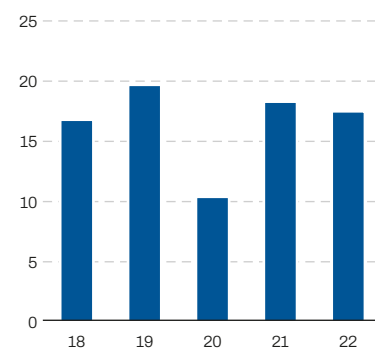
US\$ (Millions) and in %



¹⁾ 2018 continuing operations; 2019 adjusted for the EC antitrust payment

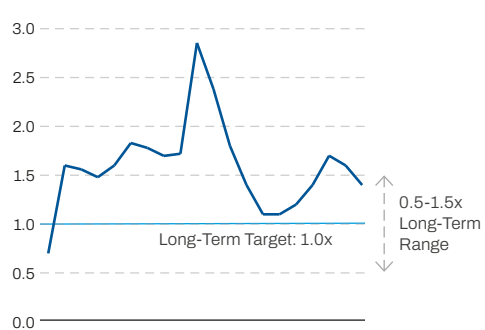
Return on capital employed

Percent



Leverage ratio

Net Debt/ EBITDA



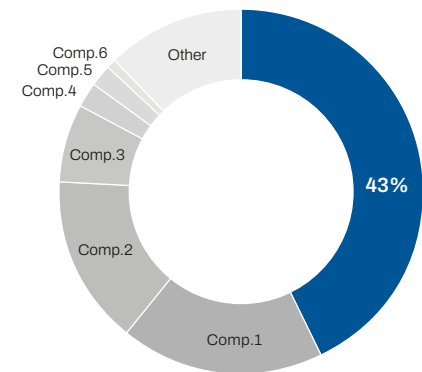
Strong Market Position in a Growing Market

Our strategy, business priorities and targets are deeply rooted in the growing global demand for traffic safety. 1.35 million lives are lost annually on the roads, according to the World Health Organization (WHO). Vulnerable road users – pedestrians, cyclists, and motorcyclists – make up about half of these fatalities. Road traffic accidents are a major cause of death among all age groups and the leading cause of death for children and young adults between the ages of 5 and 29. In addition, tens of millions suffer non-fatal traffic-related injuries, causing not only human suffering but also costs corresponding to about 3% of GDP in a majority of countries. This underlines the importance of our commitment to save more lives and reduce the number of injuries on our roads.

Market development

The automotive safety market is driven by two fundamental factors: light vehicle production (LVP) and safety content per vehicle (CPV). In the long-term, new technologies such as autonomous driving and drivetrain electrification are expected to have positive effects on the safety content per vehicle. With advanced protective systems for new flexible seating positions, safety integration in seats, human-machine interface (HMI) in steering wheels, and protection systems outside the vehicle for vulnerable road users, there is an increasing need for innovations in safety systems. In the medium term, content per vehicle is expected to grow mainly due to increased government regulations and test rating requirements in growth markets, as well as from higher installation rates of knee airbags,

Clear Industry Leader at 43%

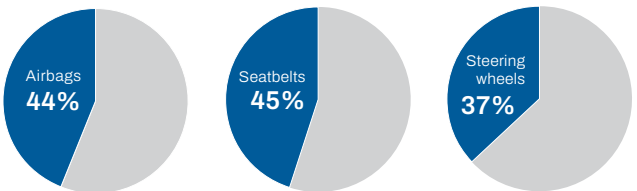


Autoliv

Company estimates. Based on Autoliv's passive safety market definition including airbags, seatbelts, steering wheels and pedestrian safety.

2022 Market share

By product area



front-center airbags, more advanced steering wheels and more advanced seatbelt systems in more mature markets. Commercial customer recoveries compensating for increased raw material costs also added to CPV in 2022.

Market position

Our long-term focus on quality, delivery and cost in everything we do is the foundation for our long-term success. We have been involved in less than 2% of recalls of airbags and seatbelts in the last 10 years, an important indicator that we are delivering on our quality strategy. Since 2017, our market share has increased by 5 percentage points to 43% in 2022. Our market position is strong in all product categories, with 44% in airbags, 45% in seatbelts and 37% in steering wheels. All three product categories have substantially improved their position since 2017. All of our largest regions have increased their market shares since 2017, to 46% in Americas, 45% in Europe, 36% in China and 39% in Japan.

Global light vehicle production

LVP has increased at an average annual growth rate of 1.6% since 1997. However, global LVP has declined from the peak of 92 million in 2017, to 79 million in 2022, mainly as a consequence of component shortages related to semiconductors. We expect that light vehicle production will continue to grow both in the short and long term. The growth is expected to take place in all regions. In the short-term, growth is expected to be driven by strong order books at the OEMs and a rebuilding of new vehicle inventories.

Content per vehicle

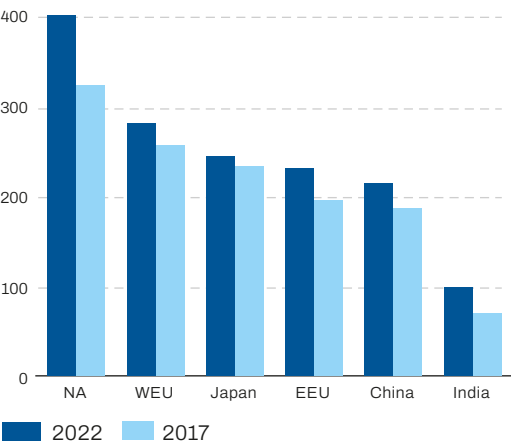
A global development towards increased safety standards with stricter regulations and increasingly stringent rating frameworks is a strong driver of safety content in vehicles. Other drivers are the premium vehicle trend and the increasing focus on safety in emerging markets. By continuously researching, developing and introducing new technologies with higher value-added features, Autoliv can influence safety content per vehicle. In 2022, global average CPV increased by more than 6%, excluding currency effects, to around \$255. As a result of the increase, the automotive safety market has outgrown LVP historically and we expect this trend to continue. Since 2017, CPV has increased in all regions, and most prominently in North America, but also in emerging markets like South America and India. In recent years India introduced regulations leading to mandatory frontal airbags for all new models, and proposed that side airbag systems also be made mandatory in the future.

Competitive landscape

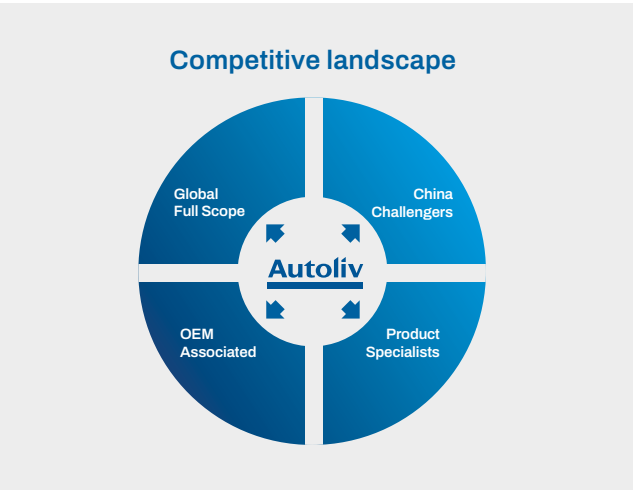
Autoliv is the undisputed leader in automotive safety. We face a variety of competitors in a landscape that is constantly evolving. We consider our key competitors to be ZF and Joyson Safety Systems (JSS), which we regard as global, full-scope competitors. ZF is a broad-based automotive supplier. JSS was formed through the combination of KSS and Takata. JSS is owned by Ningbo Joyson Electronic. In Japan, Brazil, South Korea and China, we also compete with a number of domestic suppliers, often with close ties to domestic vehicle manufacturers. We also face competition from product specialists.

Content per vehicle

US\$ per vehicle



Company estimates. Includes seatbelts, airbags, steering wheels and pedestrian safety.



At the Forefront of Automotive Safety

Based on our extensive research into real-life accidents, we develop and engineer automotive safety solutions to save more lives and prevent injuries on the roads. The way we innovate solutions is a key differentiator that sets us apart from our competitors.

FRONT CENTER AIRBAG

Enhances front-row protection

Front center airbag can prevent front-row passengers from colliding with each other during side impacts.

1

INTEGRATED CHILD BOOSTER SEAT

Provides protection and comfort

The integrated booster seat is specially designed to provide safety for children, together with the car's seatbelt.

2

SIDE AIRBAG

Protects in side collisions

Side airbags reduce the risk of chest injuries by approximately 25%. With dual-chamber side airbags, both the pelvis and the chest areas are protected which further reduces the risk of serious injuries in side-impact crashes.

3

KNEE AIRBAG

Reduces leg injuries

Knee airbags, which deploy from a vehicle's lower dashboard, distribute the impact forces on an occupant's legs, thereby reducing leg and knee injuries. Additionally, they are designed to control the movement of the occupant so that the driver and passenger airbags can provide optimal protection.

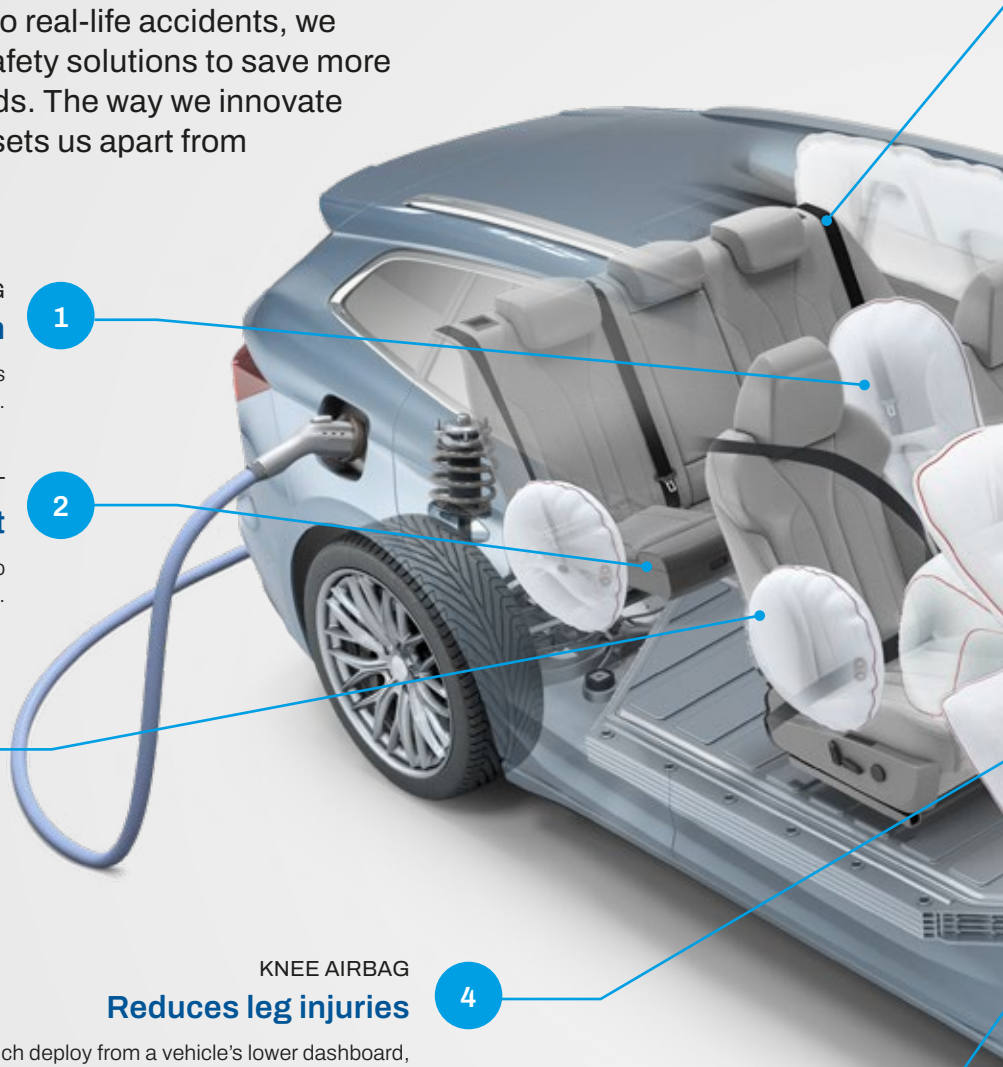
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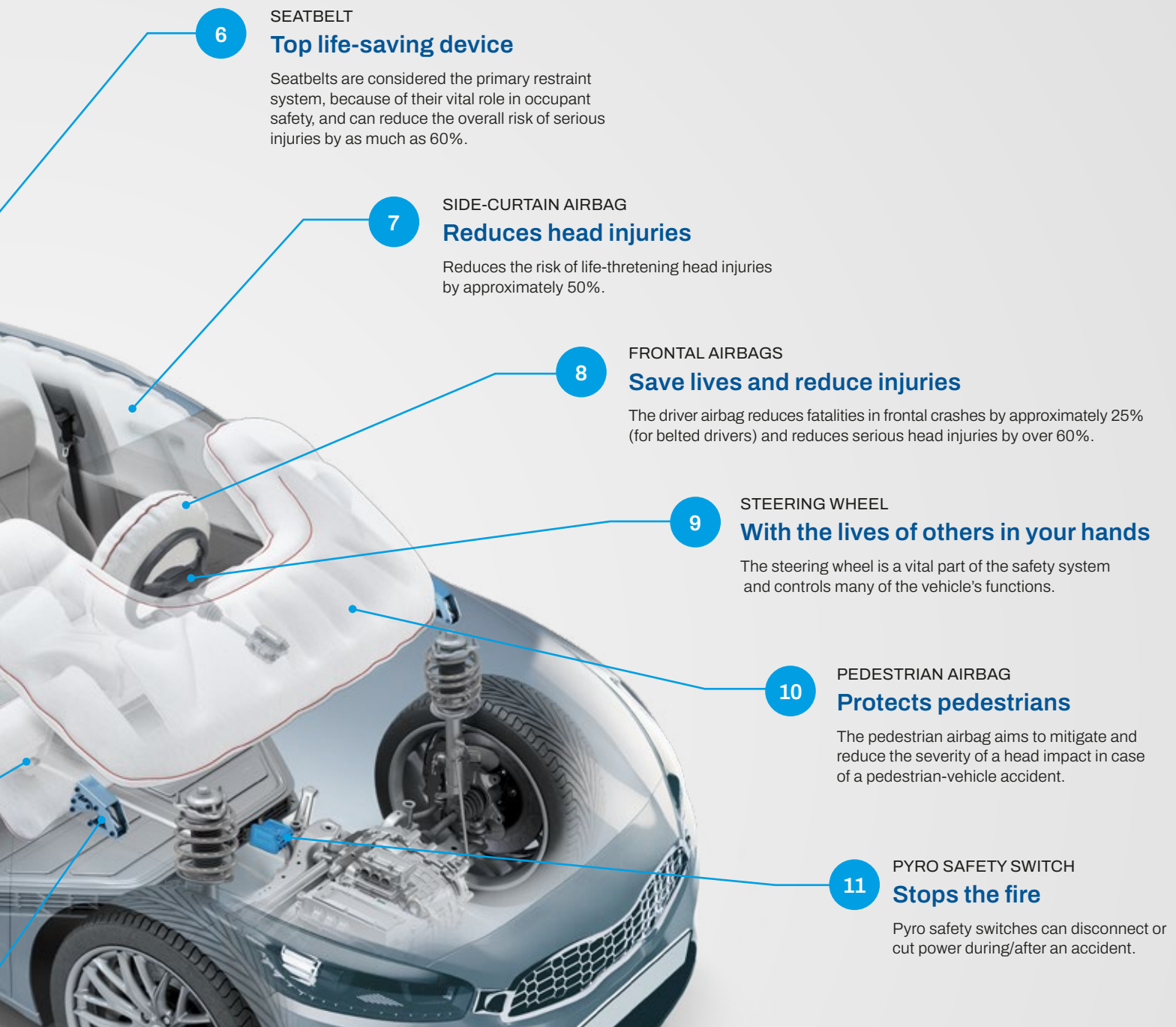
ACTIVE HOOD LIFTER

Reduces pedestrian head injuries

Active hood lifters help to mitigate the impact of a pedestrian's head against the structure beneath the hood, meaning the engine, suspension, etc.

5





6

SEATBELT**Top life-saving device**

Seatbelts are considered the primary restraint system, because of their vital role in occupant safety, and can reduce the overall risk of serious injuries by as much as 60%.

7

SIDE-CURTAIN AIRBAG**Reduces head injuries**

Reduces the risk of life-threatening head injuries by approximately 50%.

8

FRONTAL AIRBAGS**Save lives and reduce injuries**

The driver airbag reduces fatalities in frontal crashes by approximately 25% (for belted drivers) and reduces serious head injuries by over 60%.

9

STEERING WHEEL**With the lives of others in your hands**

The steering wheel is a vital part of the safety system and controls many of the vehicle's functions.

10

PEDESTRIAN AIRBAG**Protects pedestrians**

The pedestrian airbag aims to mitigate and reduce the severity of a head impact in case of a pedestrian-vehicle accident.

11

PYRO SAFETY SWITCH**Stops the fire**

Pyro safety switches can disconnect or cut power during/after an accident.

Innovative steering wheel technologies

The steering wheel is fast developing into a multi-functional Human-Machine Interface. We are driving steering wheel transformation by introducing integrated electronic and mechatronic systems for driver feedback and driver detection, as well as new stylish design opportunities.

By using 3D switches on the steering wheel, a more intuitive and ergonomic control of the vehicle's systems can be created, thereby reducing driver distraction and improving reaction time. This is complemented by a Hands-on Detection (HOD) system to ensure that the driver always is in control of the vehicle, providing an extra layer of safety when the vehicle is in autonomous driving mode.

A flexible Rim design provides an unmatched level of comfort and control, enabling the integration of Augmented Reality Windshield and Steer-by-Wire technology to take the driving experience to new heights.

With its sleek design, our Seamless Cover seamlessly integrates into the overall look of the vehicle, adding a touch of elegance to the interior while maintaining the optimal safety performance.



Around the World Deliveries

Autoliv has one of the industry’s most diverse customer bases, reflecting a strong sales mix with high-volume global vehicle manufacturers, global premium brands as well new entrants to the automotive industry. Autoliv currently delivers to around 100 vehicle brands around the world and has a leading market position with all but one of the global car manufacturers (OEMs). During 2022, we launched many new products on a number of important Electric Vehicles (EV) and Internal Combustion Engines (ICE), supporting our future growth. A contract typically covers the lifetime of a vehicle model, which is normally between five and seven years depending on customer platform sourcing preferences and strategies.

Sales by customer and vehicle type

In 2022, our top five customers represented 49% of sales and the ten largest represented 80% of sales. This reflects the concentration in the automotive industry. The five largest customers in 2021 accounted for 48% of global Light Vehicle Production (LVP) and the ten largest for 70%. The top ten customer list now includes all major Asian vehicle manufacturers, as well as a pure EV manufacturer.

Asian vehicle producers have steadily become increasingly important, mainly driven by growth with Japanese OEMs. As a group they now represent around 43% of global sales of which Japanese OEMs accounts for 29 percentage points. This is a result of our high order intake with them over the past years, built on our strong local presence in Japan and our global manufacturing footprint. Globally,

European-based brands accounted for 30% of our sales in 2022. U.S.-based brands (including Chrysler and new EV OEMs) account for 25% of our global sales. The fastest growing customer in 2022 was a global EV manufacturer, followed by Stellantis.

The Company estimates that the sales in 2022 to EVs (not including Plug-in-Hybrid vehicles) amounted to more than \$1 billion. The positive sales trend to EVs is expected to continue as around 45% of our total order intake in 2022 was for future EVs.

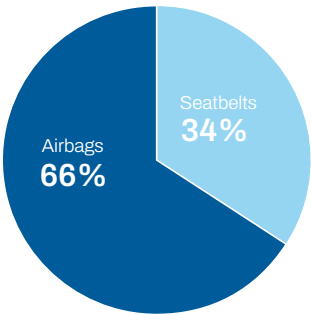
Sales by region

With operations in 27 countries and one of the broadest customer bases of any automotive supplier, Autoliv has the best global footprint in the industry. In 2022, the Asian market accounted for 40% of Autoliv sales. This was slightly lower than in 2021, despite LVP in the region increasing more than the global average. The second largest market was Americas representing 33% of sales. The European market accounted for 27% of sales in 2022, which is roughly ten percentage points less than ten years ago, reflecting a weak LVP as well as our strong market share gains in Asia and North America over the past years.

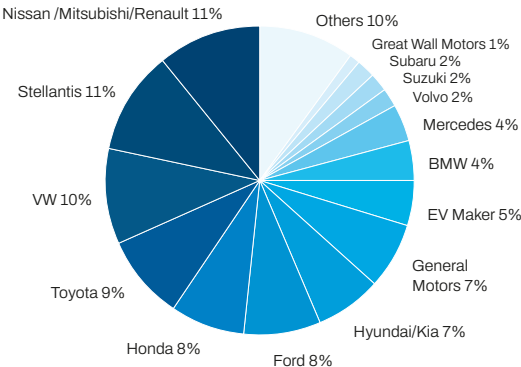
Sales by product

Autoliv is the leading global supplier of airbags, seatbelts and steering wheels. Of our \$8.8 billion sales in 2022, approximately 66% consisted of airbag products (including steering wheels) and approximately 34% consisted of seat-belt products.

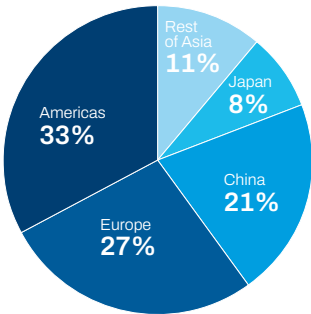
Sales by product



Sales by customer



Sales by region



Important Electric Vehicle Launches in 2022



Nio ET7



Ford Lightning



BMW i7



VW ID.Buzz



Li Xiang L9



Great Wall Ora Ballet Cat



Hyundai IONIQ 6



Xpeng G9



Renault Megane E-Tech

Uniquely Positioned to Save More Lives



As Autoliv has pioneered automotive safety for almost exactly 70 years, including the introduction of many world firsts, we have become the largest supplier of automotive safety systems. We are expanding our focus beyond light vehicle safety to a wider mobility safety arena. Industry trends, such as electrification, autonomous driving, shared mobility, digitalization and connectivity, and more comfortable interiors and cockpits, are giving rise to new safety needs that call for more sophisticated and digital safety products, both inside and outside the car. Our approach to real-life safety to meet emerging safety needs throughout the entire mobility chain, from in-vehicle occupants in different levels of automated vehicles to vulnerable road users such as pedestrians and riders of two-wheelers, together with our methods and processes, puts Autoliv in a unique position.

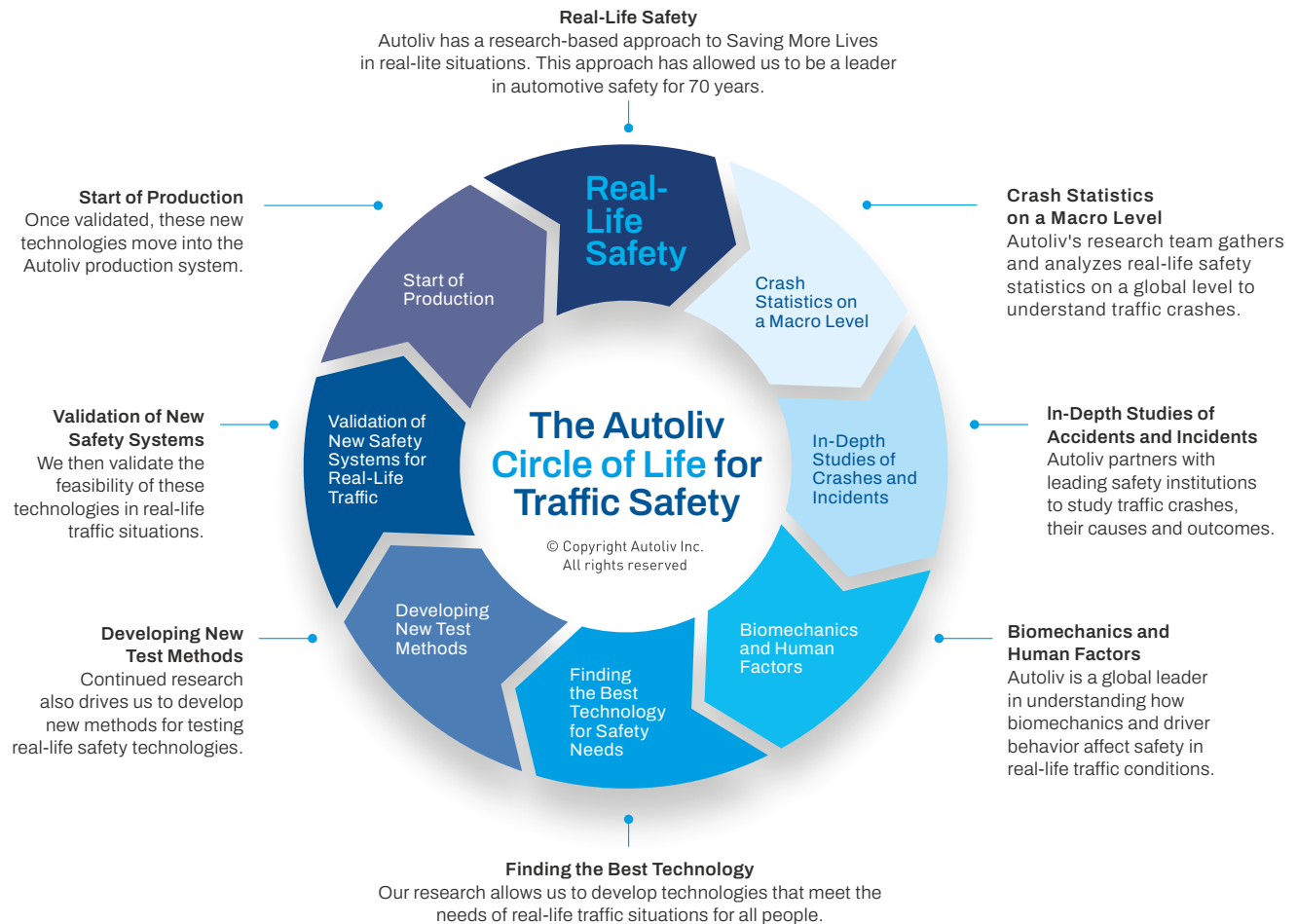
We support our customers through our technical centers and manufacturing facilities located close to their assembly plants. We employ 5,700 people in research, development and application engineering (RD&E). A large portion of our RD&E resources are focused on application engineering to adapt safety products to new vehicles.

We innovate, develop and customize our airbag, seat-belt, steering wheel and other solutions and systems to improve safety, comfort and usability with the aim of Saving More Lives in road traffic.

Our solutions strive to accommodate any kind of journey in a constantly changing environment where a vehicle occupant or a road user meets a mixed fleet of traditional and new types of vehicles. In addition, we continuously innovate to make things smaller and lighter – such as our driver airbags – or better integrated – such as our advanced seatbelt solutions integrated into seats – as well as applying more decentralized intelligence – such as our small integrated decentralized electronic control units (ECUs) for future steering wheels.

Innovation through collaboration

We are engaged in research activities across multiple disciplines such as biomechanics, human factors and traffic safety analysis as well as computer science and chemistry. Through our research and collaborations, we aim to improve safety for all, meaning that regardless of what type of road or user you are or the type of vehicle used you should have a safe journey.



We also engage in multi-partner government-funded projects. In the area of car occupant safety, the project Proactive Safety Systems and Tools For Constantly Upgrading Road Environment (Safe-Up) will be concluded during 2023, ending our successful collaboration with European partners to enable safe new seating positions in future collision scenarios involving connected and autonomous vehicles. On the same topic, we are continuing our engagement in the Steering Committee for the Research Consortium for Crashworthiness in Automated Driving Systems (RCCADS) in the US.

In the area of vulnerable road users, we are continuing our efforts to create a Motorcycle Rider Model for injury prediction, to further enhance our human body model in predicting injuries sustained by motorcycle riders in crashes. We have also developed a new powered two-wheeler dummy together with Humanetics.

We showed a car-based external airbag for cyclist protection in side impacts at the SAE World Congress in Detroit in 2022, an airbag integration into a bicycle helmet at the Airbag 2022 conference in Germany and a face airbag at the IRCOBi conference in Portugal.

We also engaged with numerous stakeholders in the Motorcyclists Safety Workshop, Riding in a Safe System, organized by International Transport Forum, where eight priority areas were highlighted by the workshop to achieve the integration of powered two-wheelers into the safety system by 2030. As the safety of motorcycle riders is a huge challenge in Southeast Asia, we also entered in an agreement with the Malaysian Institute of Road Safety Research (MIROS) where we collaborate on on-rider and on-bike protection.

Innovations driven by human behavior and accident research

To constantly improve traffic safety, we need to know what is happening on the roads today, how current safety systems perform in real-life traffic, and how to design safety systems for the future. The analysis and predictions from this research serve as the basis for the development of future safety systems

During 2022, we analyzed and published data on crash

characteristics and injury risk in near-side impacts in the US, an analysis of sampling bias and weight factors for in-depth motorcycle crash data in Thailand, characteristics of future crashes on Indian roads using counterfactual simulations of pre-crash vehicle safety technologies, and fatality and injury risks of pedestrians, cyclists, motorcyclists, and car drivers as a function of impact speed and age using German data.

As a contribution to understanding driver state, we published a study in the journal Accident Analysis and Prevention entitled “Detecting driver fatigue using heart rate variability: A systematic review”. We also presented the studies “Human-machine interface designs assisting drivers of automated vehicles during transitions: evaluation from an end-user perspective” and “Heart rate variability as an indicator for driver fatigue, different effects of time of day and time-on-task” at Driver Distraction and Inattention conference in Sweden. Monitoring driver state using the seatbelt or steering wheel along with two sensors close to the driver/occupant can provide the necessary redundancy for a camera-based monitoring system.



Autoliv and Malaysian Institute of Road Safety Research Collaborate to Save More Lives

Road traffic accidents claim 1.35 million lives every year and are the leading cause of death among children and young adults. More than 90% of road traffic fatalities occur in developing countries. The safety of motorcycle riders is a major challenge in Southeast Asia and motorcycle crashes accounted for 66% of all traffic fatalities in Malaysia in 2021.

In 2021, Autoliv entered a partnership with the Malaysian Institute of Road Safety Research (MIROS), an organization with a progressive approach to road safety in Malaysia and a particular focus on powered two-wheelers. The collaboration directly supports Autoliv's vision of Saving More Lives and UN Sustainable Development Goal 3, which aspires to ensure good health and well-being for all, with one of its targets focused on halving global deaths and injuries from road traffic crashes.

"I am very excited and fully support the development of this motorcycle airbag technology. I am sure that MIROS will support and cooperate with Autoliv in the development of this technology and evaluate its potential to save motorcyclists in our country going forward," says Dr. Wee Ka Siong, Minister of Transport in Malaysia.

"Autoliv is committed to our vision of Saving More Lives and to providing world class life-saving solutions for mobility and society. Autoliv is prioritizing developing products that specifically protect vulnerable road users. The development of these products is an integral part of our sustainability agenda," said Mikael Bratt, CEO and President, Autoliv.

The MIROS collision test laboratory, PC3 Crash Lab, has played an important role in the vehicle safety ecosystem over the past ten years. Industry partners such as Autoliv conduct research and development in collaboration with the test laboratory to improve the level of road and vehicle safety in Southeast Asia and worldwide.

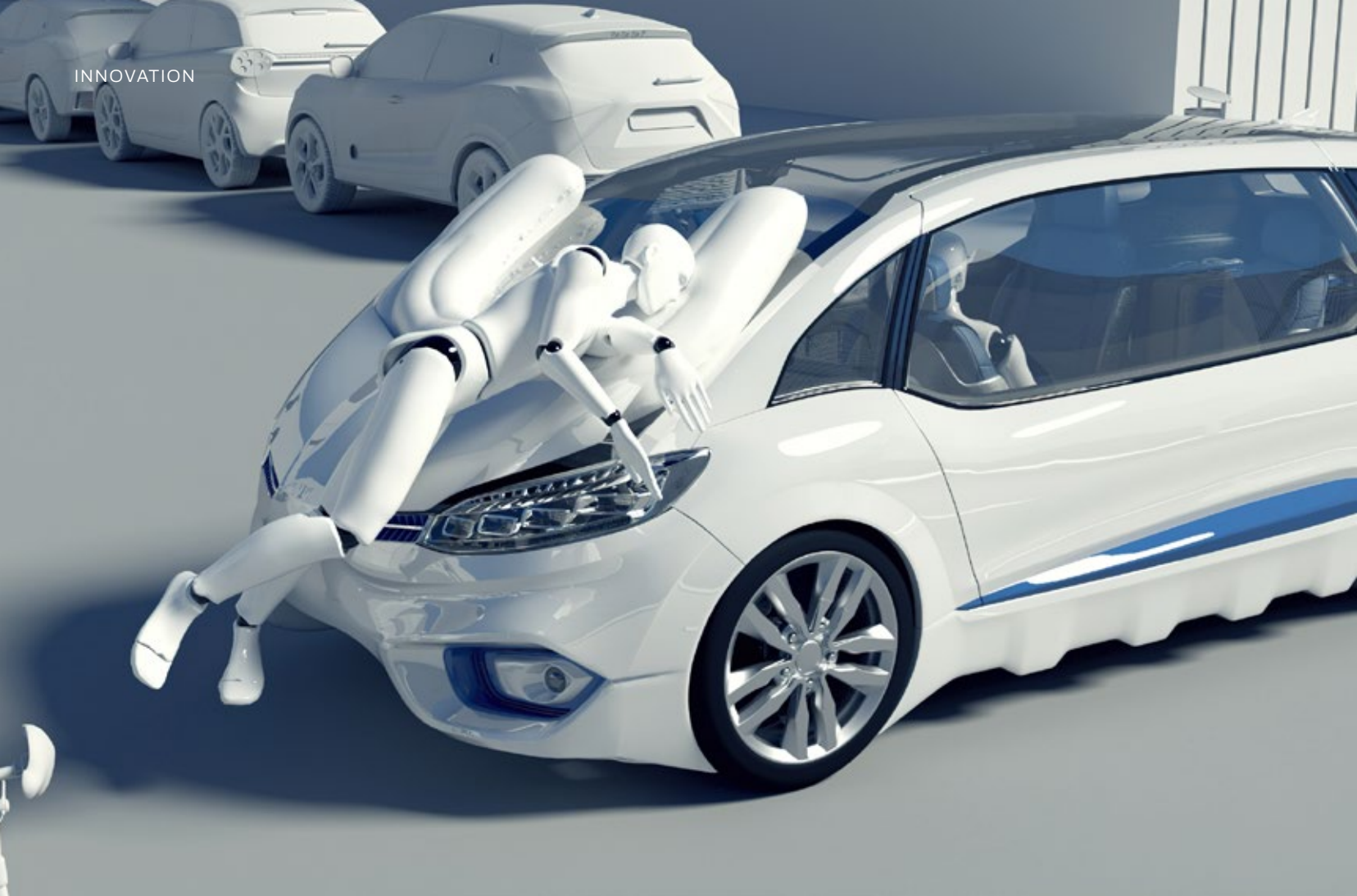
"It was a privilege to be a part of the MIROS tenth anniversary event and be asked to conduct a crash test with new technology that brings us one step closer to saving more lives in Southeast Asia. Autoliv has an important role to play in markets like Malaysia, and I am proud to see Autoliv's airbag for powered two-wheelers generating interest in the country," says Cecilia Sunnevang, Vice President Research at Autoliv.



"I am very excited and fully support the development of this motorcycle airbag technology."

DR. WEE KA SIONG,
MINISTER OF TRANSPORT IN MALAYSIA





Innovating for a Safer Society

Our focus areas for future mobility

Staying at the forefront of safety technology is key in supporting our long-term growth in a rapidly changing technology environment. Vehicles of the future, with increasing levels of electrification and autonomy, are placing new demands and are creating new opportunities for automotive safety systems. Our safety solutions for electric and autonomous vehicles are a natural evolution of our safety products, positioning Autoliv at the forefront of innovation.

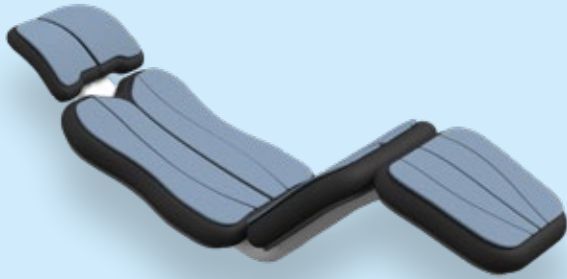
We strive to improve existing airbag effectiveness and to develop new types of airbags to meet new challenges with electric and autonomous vehicles. We continuously develop new seatbelt systems for new seating positions and improved comfort to accommodate any kind of journey. Our

research in steering wheel technology has resulted in improved ease of control by integration of mechatronics and additional driver monitoring systems, including solutions for autonomous driving.

Today, vulnerable road users (VRUs) – pedestrians, cyclists and riders of powered two-wheelers – account for nearly half of all road fatalities. Protecting VRUs is a natural progression of our real-life approach to safety.

We have collected adjacent business opportunities, including safety for powered two-wheelers, into Mobility Safety Solutions (MSS). In MSS we investigate opportunities where our core product and product competences can be applied for additional growth.

Safety for Autonomous Driving



Seatbelts for "zero gravity"-style seats

Autoliv is in development for series production of a seatbelts for "Zero Gravity" car seats intended for self-driving vehicles.



Hands-on detection

Autoliv is developing steering wheels with hands-on-detection, for self-driving vehicles, featuring capacitive switches.

Safety for Electric Vehicles



Silent seatbelts

Electric cars are substantially more quiet than traditional cars with combustion engines. Therefore, it is becoming increasingly important to reduce disturbing noise from various products, such as through so-called "silent seatbelts".



Battery cut-off switch

The Battery cut-off switch disconnects and cuts power from the high voltage battery in a crash, preventing battery failures and overcharging due to short circuits, which can lead to thermal events and fires.

Safety for Vulnerable Road Users



Motorized two-wheelers

The airbag systems for powered two-wheelers is mounted on the vehicle frame and will deploy in milliseconds, for greater rider safety.



Vulnerable road users

To protect vulnerable road users, such as pedestrians, cyclists and riders of powered two-wheelers, cars can be equipped with pedestrian airbags or active hood lifters. In the event of frontal collisions, the system protects the occupant by an outside airbag or by raising the rear-end of the hood, using it as a cushion.

Building a Winning Team



Collaboration is core to how we work at Autoliv. No matter where we sit in the organization, it is by working together that we enable people to grow and deliver excellence to our customers and other stakeholders.

In Autoliv, we want each individual to reach their full potential – this is the very foundation for building a high-performing team. Through strategic workforce planning, we identify talent needs and talent gaps, and determine the appropriate mix of strategies to enable people to grow. We take great pride in working together to provide lifesaving solutions for mobility and society – from the earliest stages of product development to sales and design and through the final delivery of the finished product. We strive to be the best employer, where our team members can be themselves, develop and deliver results together.

Employee development

Supporting the development of our employees is essential in a highly competitive and rapidly changing environment. We offer continuous personal development by creating an attractive workplace and by providing a collaborative and positive work environment where we focus on performance, tackle challenges, and achieve great things together. An important cornerstone of each employee's growth is the ongoing personal, transparent communication between the team member and manager, which is summarized during an annual performance and development dialog (PDD). During 2022, 99% of targeted employees conducted a PDD with their managers.

To further support the growth of our employees, we have a multitude of development channels, including facilitated and self-paced development programs, such as technical and specialist career paths and international assignments. We promote continuous on the job development every day, and more than 4,000 employees attended at least one development program in 2022.

Health and safety

Ensuring a safe and inclusive workplace is a top priority for Autoliv. Our health and safety goals are clear. We want zero accidents in the workplace, and we are dedicated to preventing all occupational injuries, be it from lifting heavy objects or working late hours.

The management of Autoliv is strongly committed to providing safe and healthy working conditions for all our people

and contractors. Our ambitious goals require that we all take ownership and proactively care for ourselves and one another. We strive to make health and safety an integrated part of our daily work, on all levels and across functions. In 2022, we initiated a Health and Safety leadership training which is rolled out globally. The purpose is to empower and inspire everyone to work proactively with health and safety issues.

Our continuous work with risk assessments is vital. We continuously work to improve our ability to identify risks and prevent injuries by actively involving teams who are exposed to an area of risk in the assessment process. This enables us to leverage valuable insights from around Autoliv and makes it easier for all of us to take ownership of our safety. Just like our vision, Saving More Lives, ensuring a safe work environment, is a collective achievement.

Diversity and inclusion

The diversity of our people is one of the things that makes Autoliv great. Our workforce reflects the diversity of the countries and cultures in which we operate. The more diverse our organization, the better we will be at anticipating, leveraging, and adapting to future needs and changes.

Inclusive ways of working are an asset and a fundamental part of the Autoliv Key Behaviors that were launched in 2021. Including a multitude of perspectives is an integral part of successful decision-making in all parts of the organization and helps drive innovation and create long-term sustainable shareholder value in a rapidly changing industry. We believe that everyone should be respected and treated fairly, and we are committed to providing an inclusive and diverse workplace where everyone can be themselves, deliver results and bring their authentic selves to work.

Labor rights

We offer fair terms and conditions of employment. Our Key Behaviors, Code of Conduct, talent development strategies and employment policies support the principles in the United Nations Universal Declaration of Human Rights, and the International Labour Organization's Fundamental Principles and Labour Standards.

Quality at The Forefront of Everything We Do



We can never lose sight of our vision of Saving More Lives, and our products never get a second chance. This is why we can never compromise on quality.

In addition to our primary goal of saving lives, quality is key to our financial performance, since quality excellence is critical for winning new orders, preventing recalls and maintaining low scrap rates. For all of these reasons, we are committed to providing customers with products and services that are – and are perceived as – more valuable than those of our competitors. We strive for zero recalls, zero repeat issues and a year-on-year reduction of total non-quality costs.

By embodying our Key Behaviors, we lead by example and contribute to the journey towards zero defects. Our goal is for all functions in Autoliv to think, plan and execute based on a zero-defect mindset, whether working with products or services.

Our zero-defect principle extends beyond Autoliv to the entire supplier base. We work proactively with our suppliers, using audits, Go & See, Lean manufacturing training and other tools to minimize risk and continuously develop our supplier base.

Quality leadership

Quality assurance is a continuously ongoing process along the end-to-end value chain. Increasing our utilization of data is significantly improving our possibilities to monitor and act on anomalies early on.

To achieve this, we establish a digitalized and connected data foundation that we can build on to become smarter in our operations and quality work. This gives us possibilities to carry out more automatic inspections supported by machine learning to improve our capabilities to identify potential quality problems, and to reduce the dependency on human inspection variability.

Our quality culture

We are adapting our ways of working to incorporate quality earlier in the design process and cooperate more closely with suppliers to further improve our zero-defect performance applying our Q5 methodology – quality in all dimensions.

The Q5 program addresses quality in five dimensions: customers, products, employees, processes and suppliers.

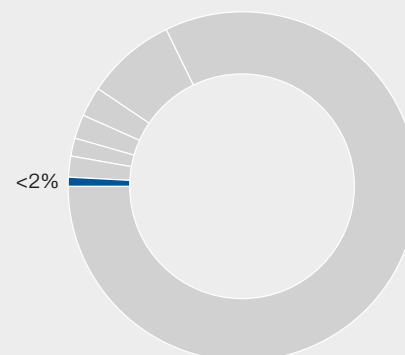
In 2022, the journey towards zero defects continued, and we saw an improvement in the number of zero-defect lines. This was achieved through well-defined cross-functional workshops to eliminate potential defects, and an ongoing drive to empower teams with a proactive mindset. A vital part in this is the culture of Jidoka, where an operator who detects an anomaly can directly stop the line and allow for appropriate actions to be taken.

Our quality performance

We have been involved in less than 2% of recalls of airbags and seatbelts in the last ten years, an important indicator that we are delivering on our quality strategy. Additionally, we monitor our quality culture through a regular employee survey that helps each site identify areas for improvement. Autoliv's quality management system is regularly audited by both internal and external parties.

Minimal recalls

Share of airbag and seatbelt recalls in vehicles in the past 10 years¹



■ Autoliv ■ Other











1) The share is calculated as a ten year rolling average based on information from national official databases.

A Driving Force in Sustainable Mobility

Guided by our vision of Saving More Lives, our mission is to provide world-class, life-saving solutions for mobility and society. Sustainability is an integral part of our business strategy and a fundamental driver for market differentiation and stakeholder value creation, helping to ensure that our business will continue to thrive and contribute to sustainable development in the long term. To truly be a driving force

in sustainable mobility, we strive to systematically assess and to manage key impacts, risks and opportunities on society and the environment related to our business, operations and supply chain. We also engage with our customers to ensure that we are part of driving the transition to low-carbon and circular mobility, thus realizing new business potential.

Our sustainability approach is based on four focus areas, with broad ambitions and more specific short-term targets

Focus Area	Ambitions	Sustainable Development Goals
Saving More Lives	100,000 lives saved per year	  
A Safe and Inclusive Workplace	<ul style="list-style-type: none">• Zero accidents• Embrace inclusive ways of working	  
Climate Action	<ul style="list-style-type: none">• Carbon neutrality in own operations by 2030• Net zero emissions across our supply chain by 2040	  
Responsible Business	<ul style="list-style-type: none">• Proactively prevent corruption and other unethical business practices• Respect human rights• Manage supply chain sustainability risks	



defined for each area. These areas represent the strongest links to our business risks and opportunities and the greatest impact on key stakeholder groups, society and the environment. All four areas represent global challenges where we believe that our work can make a positive difference, through our Ways of Working or by inspiring and collaborating with others. We are a signatory of the UN Global Compact and our work and policies, such as our Code of Conduct, are aligned with international frameworks such as the ILO core conventions and the OECD Guidelines.

Our core business and sustainability work contribute to the realization of a number of UN Sustainable Development Goals (SDGs). Our core business directly contributes to reducing the number of road fatalities (SDG 3) and making transportation systems safer for everyone, including vulnerable road users (SDG 11). We actively support research and knowledge sharing that benefit developing markets (SDG 17). Over time, our climate and circularity agenda aims to not only greatly reduce our own negative environmental impact (SDG 9, SDG 13) but also help drive green innovation (SDG 12) among direct material suppliers, vehicle manufacturers and energy providers (SDG 7). By proactively managing health and safety risks and labor rights (SDG 8), promoting diversity and inclusion (SDG 5) and holding all employees to the highest ethical business standards (SDG 16), we lay the foundation for a high-performing organization where every employee has the means to speak up and drive improvement.

For more information about performance data, definitions, etc., see the Sustainability Appendix on p. 61-64.

Autoliv's Multi-year Commitment to Support the United Nations Road Safety Fund



Autoliv is supporting the effort of the United Nations Road Safety Fund, UNRSF, to strengthen insights into road safety challenges and contribute to safer mobility where it is most needed.

By exchanging valuable insights, knowledge, and data, Autoliv and the UNRSF will actively support the Global Plan for the Second Decade of Action 2021-2030, which seeks to prevent at least 50% of road traffic deaths and injuries by 2030.

Road traffic crashes claim 1.35 million lives every year and are the leading cause of death among children and young adults. More than 90% of road traffic fatalities take place in developing countries. Autoliv's support of the UNRSF is an important step to further democratize road safety and increase awareness and availability of life-saving products.

Autoliv's vision of Saving More Lives directly supports UN SDG 3, which aspires to ensure good health and well-being for all, with one of its targets focused on halving global deaths and injuries from road traffic crashes.

"Cross-sector collaboration is key if the world is to advance its positions with respect to the Sustainable Development Goals. Supporting the UNRSF is a way for Autoliv to share our expertise while gaining additional insights into the main road safety challenges facing the world today. Through our core business of

life-saving products, we have an important role to play. Saving More Lives is an integral part of our sustainability agenda," said Mikael Bratt, CEO and President, Autoliv.

"Autoliv directly supports the UNRSF's thinking on high-impact road safety projects"

NNEKA HENRY,
HEAD OF THE UNRSF SECRETARIAT

"As a member of the multi-stakeholder UNRSF Platforms of Engagement, Autoliv directly supports the UNRSF's thinking on high-impact road safety projects. With its financial contribution, Autoliv is also directly supporting UNRSF project operations in low- and middle-income countries. It is this type of multi-pronged engagement from the private sector that will leapfrog the global community towards achieving the SDGs related to safe, sustainable and inclusive mobility for all," said Nneka Henry, Head of the UNRSF Secretariat.

Autoliv's commitment to support the UNRSF will directly result in road safety interventions in low- and middle-income countries ranging from better vehicle standards and road infrastructure design to effective systems to improve road user behavior and emergency post-crash response.

Materiality Assessment

The starting point for sustainability management and reporting is understanding our most material topics. Our materiality assessment aims to identify the key sustainability topics in our own operations and our value chain. The process is based on the double materiality principle: both impact materiality (how Autoliv impacts people and the environment) and financial materiality (how various sustainability topics impact Autoliv) are considered.

Materiality assessment is part of the Enterprise Risk Management (ERM) process and is carried out on an annual basis. In 2022, the process was further developed to ensure that we are aligned with current and upcoming legislation on corporate sustainability due diligence and sustainability reporting, in particular the upcoming EU Corporate Sustainability Due Diligence Directive, EU Corporate Sustainability Reporting Directive and SEC regulations. Assessment activities included:

- Workshops with internal topic experts as well as representatives from other functions to ensure a broad inside-out understanding of current and future topics

- Review of industry-related reports, etc. regarding impacts, risks and opportunities
- Market research as well as direct dialog to understand our customers' sustainability priorities, challenges and opportunities for collaboration
- Investor-driven sustainability/ESG assessments and face-to-face meetings with key shareholders
- The annual Autoliv Quality Culture employee survey, quarterly Pulse employee surveys and Autoliv's Speak Up channel

For many of the most material topics, we also carry out topic-specific assessments to gain a deeper understanding of both impact and financial materiality. For example, for climate change, we have carried out an extensive value chain GHG footprint assessment, identified emission sources and reduction levers, and identified key transition and physical risks and opportunities that could impact our business. For more climate change-related information, see the TCFD Disclosure, p. 46-47.

In 2022, key material topics identified included:

Environment	Social	Business ethics
Climate change Circularity	Life-saving products and innovations Product safety Health and safety Inclusion Labor rights	Anti-corruption Anti-trust

Supply chain sustainability impact and performance cut across most of the above topics, in particular regarding climate change, circularity, product safety, health and safety, labor rights and business ethics.

While many of the topics listed above have been considered the most material for several years, some topics such

as inclusion and circularity are growing in importance driven by trends of natural resources scarcity and more complex operating environments. The material topics are covered by our sustainability focus areas, with targets and action plans defined for each of these focus areas to ensure that we make measurable progress.

Autoliv and POC Join Forces to Reduce Cyclist Head Injuries



“Our safety mission drives everything we do, and we always challenge conventional thinking in order to improve protection.”

OSCAR HUSS, CHIEF PRODUCT OFFICER, POC

Autoliv and POC, a global leader in snow sports and cycling protection, have joined forces to study and develop bicycle and e-bike helmets equipped with airbag technology to improve head protection and reduce the consequences of an impact.

Head injuries alone account for half of all deadly cyclist injuries. Although it has been established that helmets are beneficial to head safety, the latest Bicycle Safety Report by Swedish insurance company Folksam makes the case that helmet absorption efficiency could still be greatly improved, especially when collisions occur with a car at speeds above 20 km/h (12 mph).

POC and Autoliv have been working together to assess the potential of using airbag technology in helmets. The airbag would act as the initial energy absorber while the underlying helmet would act as a secondary energy absorber.

After conducting a pre-study, the Autoliv research team concluded that a bicycle helmet with an integrated airbag can significantly improve protection and reduce the consequences of impacts to cyclists. The combination of both absorbing technologies enables a reduction of peak linear head acceleration and significantly reduced

the risk of head injuries in impact tests. The pre-study also showed that these protection improvements could be achieved without critically compromising the design, weight, or comfort of a helmet equipped with integrated airbag technology.

“Autoliv is committed to the vision of Saving More Lives and to providing world-class life-saving solutions for mobility and society. The safety of vulnerable road users, such as cyclists and e-bike riders, is high on our agenda. Therefore, it was natural to collaborate on this initiative with POC, a leader in cyclist safety, to explore how to improve helmet protection in current standard testing and more challenging scenarios, such as higher impact speeds”, said Dr. Cecilia Sunnevang, Vice President Research, Autoliv.

The pre-study showed that the addition of airbag technology on top of the helmet could significantly contribute to enhanced safety performance, especially in linear impacts. It is estimated that the risk for a bicyclist to sustain moderate to fatal head injuries is reduced from 80% to 30% in a 20 km/h (12 mph) impact.

“Our safety mission drives everything we do, and we always challenge conventional thinking in order to improve

protection. Helmets are tested and certified in a laboratory setting and can never fully address all the real-world variables of bike crashes. Together with Autoliv, who are world-renowned and have some of the most advanced testing and research facilities in the field, we have embarked on a development journey with airbag technology, asking ourselves what could be done to excel in current test scenarios and push the envelope towards even more shock absorbing capacity”, said Oscar Huss, Chief Product Officer, POC.

Finding new ways to save lives

Boosted by an increased environmental consciousness and the emergence of e-bike commuting, the number of bicycle riders worldwide is increasing rapidly. This growth needs to be supported by improved helmet protection, especially at higher speeds enabled by e-biking. During the pre-study, Autoliv and POC developed the initial concepts using advanced simulation tools and conducted correlated physical crash tests. The successful outcome of the pre-study will now lead to further testing and refinement, with the objective of developing the concept further and potentially bringing a product to the market.

Sustainability Governance

Autoliv's sustainability work is managed within a well-defined governance structure, with clearly established ownership and responsibilities at all levels in the organization.

The underlying principle of our governance model is integrating sustainability responsibilities into the ordinary course of business and company processes. This means that the ultimate responsibility for executing sustainability activities and targets lies with the line organization and is regularly monitored through management reporting. According to our Key Behaviors, we expect every employee to take ownership of sustainability topics by proactively contributing improvement ideas as well as by following company policies and standards.

Ultimate oversight of the company's sustainability activities lies with the Board of Directors. The Board sets the direction for sustainability activities and regularly monitors progress on Autoliv's sustainability strategy and targets through its Nominating and Corporate Governance Committee (NCGC). The Board reviews and approves the Code of Conduct as well as the Annual and Sustainability Report and the Modern Slavery Act Statement.

Implementation responsibility for sustainability lies with the Executive Management Team (EMT). The EMT has appointed a Sustainability Board charged with providing regular direction and oversight. The Sustainability Board consists of the CEO and other EMT members and meets on a quarterly basis. The Sustainability Board reviews and approves Autoliv's sustainability strategy, annual and long-term plans, targets and policies for key topics, and monitors implementation and performance.

Integration of sustainability into Autoliv's business is led by the Group HR & Sustainability function. The Vice President, Sustainability, who reports to the Executive Vice President, HR & Sustainability, coordinates, develops and monitors Autoliv's sustainability agenda and facilitates the Sustainability Board meetings and other sustainability-related reporting to management. Everyday sustainability topics are managed, as appropriate, by the HR & Sustainability function, divisions and other corporate functions such as supply chain management, research, development and engineering, and legal and compliance. Divisions and

corporate functions have dedicated sustainability resources such as Environment, Health & Safety coordinators, life-cycle assessment (LCA) experts and supplier sustainability auditors.

Risk Management

Autoliv has a global risk management organization and utilizes several different tools, such as an enterprise risk management (ERM) framework which includes annual, divisional, functional and corporate risk mapping activities, monitoring risk trends, implementation of risk improvement plans and follow-up of the effectiveness of risk mitigation measures. Risk reporting is done on a regular basis to the Audit and Risk Committee as well as the Board of Directors. With regard to sustainability-related risks, the ERM framework takes into consideration the double materiality perspective. This means assessing both how Autoliv's operations impact people and the environment, and how various sustainability topics impact Autoliv's business. Sustainability risks, such as product safety, climate change, natural resources scarcity, environmental compliance, health and safety and other labor rights, business ethics, business conduct and supply chain sustainability, are included in the ERM framework. We assess how sustainability relates to business risks, such as legal proceedings, regulatory changes, contingent liabilities, supply chain disruptions and operational disruptions. Furthermore, there are relevant corporate standards for topics such as site risk management, loss prevention, emergency procedures, business contingency planning and physical security.

A more detailed description of Autoliv's material operational, strategic and financial risks, including sustainability-related risks, can be found in the "Risk Factors" and "Risks and Risk Management" sections of the 10-K filed with the SEC. More information on climate-related risks can be found in the TCFD disclosure, p. 46-47.



Sustainability Governance

Board of Directors

Nominating & Corporate Governance Committee

Executive Management Team

Sustainability Board

EVP, HR & Sustainability

VP, Sustainability

Organization

Functions

Divisions

All employees

Ambition:

100,000

Lives saved per year

2022 Outcome:Close to **35,000** lives saved

Road Safety – a Global Challenge

When the UN SDGs were launched, road safety was made a global priority for good reason: 1.35 million people die in traffic every year, a figure likely to increase significantly unless disruptive action is taken.

According to the World Health Organization (WHO), road traffic injuries are the leading cause of death among young people between the ages of 5 and 29. Low- and middle-income countries are hit the hardest, accounting for over 90% of global traffic deaths. As well as being a public health problem, road traffic injuries are a development issue: according to WHO, low- and middle- income countries lose approximately 3% of their GDP as a result of road traffic crashes. Many families are driven into poverty by the loss of a breadwinner or by the expenses of prolonged medical care. The societal costs are also significant for developed countries: the US National Highway Traffic Safety Administration estimates the total societal cost of US traffic crashes in 2019, which led to 36,500 fatalities and 4.5 million injuries, at a staggering \$340 billion.

In August 2020, the UN General Assembly adopted the resolution "Improving global road safety", proclaiming the Second Decade of Action for Road Safety 2021-2030. The target, represented as SDG 3.6, is to reduce road traffic deaths and injuries by at least 50% by 2030. According to the resolution, vehicle safety is a key component and member states are encouraged to adopt vehicle safety regulations that make seatbelts, airbags and active safety systems standard equipment. In addition to safer vehicles, infrastructure improvements, road user behavior and protective equipment are also key to achieving the target.

Our ambition and approach

Saving More Lives is our core business and our most important contribution to sustainable development and the realization

of SDG 3.6. According to our estimations, our products in use already save close to 35,000 lives and reduce more than 450,000 injuries every year.

Our long-standing ambition is for our products to save 100,000 lives per year. Achieving this ambition is based on:

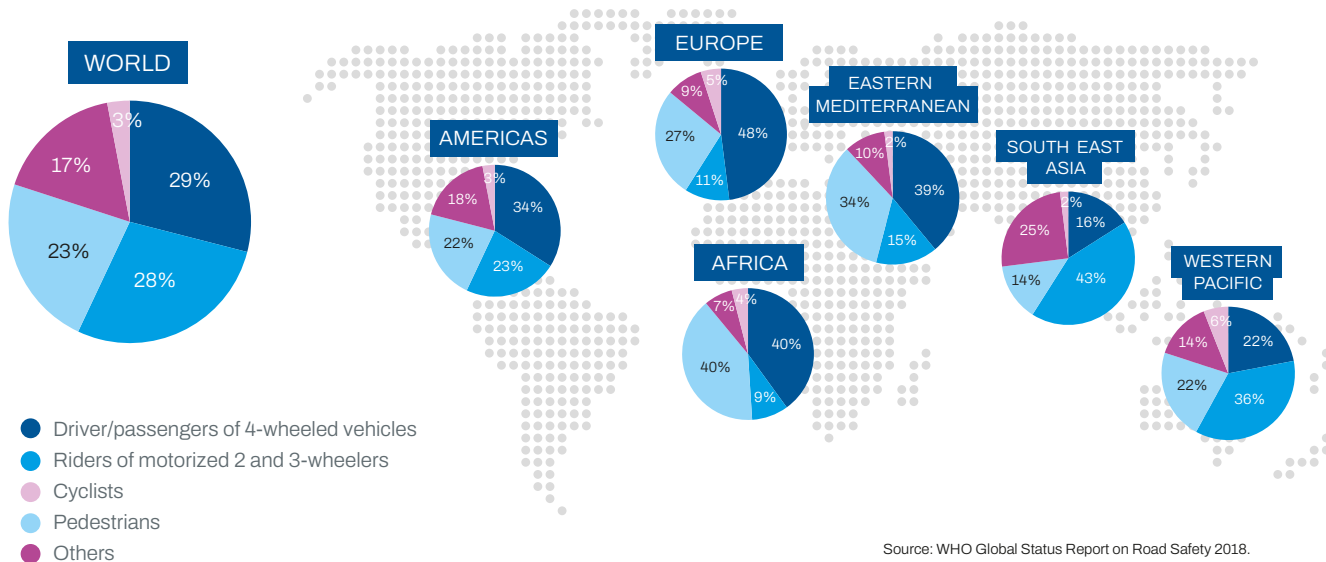
- Retaining our strong market position and continue to grow in our core business, including increasing content per vehicle. This needs to be done while maintaining the highest level of quality – our products never get a second chance.
- Successfully expanding our business in new mobility segments such as motorcyclists, and better protection of vulnerable road users. This includes proactively broadening the scope of research and development to also cover a wider range of parameters regarding height, weight, age and gender.
- Increased multi-stakeholder efforts in education to increase seatbelt use since they are the most effective way of reducing fatalities and serious injuries.

Research and development collaborations

We proactively engage with national and international authorities as well as academia to further our impact. Below are some examples of our collaborations during 2022.

- Together with Piaggio, we are developing a motorcycle airbag. During the year, the airbag concept was demonstrated in Malaysia together with the Malaysian Institute of Road Safety Research (MIROS). In addition to in-vehicle solutions, we are also exploring how to increase the comfort and safety of personal protective equipment, such as helmets with integrated airbags that provide improved protection of the head and face and inflatable vests that improve protecting of the thorax and shoulders.

Distribution of fatalities by road user type



- We remain a Steering Committee member of the Research Consortium for Crashworthiness in Automated Driving Systems (RCCADS), which aims to collaboratively work towards validation methods for automated driving systems. During 2022, we advanced our knowledge in several areas related to impact modelling of automated driving systems.
- Around 15% of the over 8,000 car occupant fatalities in the EU in 2020 occurred in crashes with Heavy Goods Vehicles (HGVs). Together with our partners in the SAFE-UP project, funded by the European Commission, we found crashes involving cars and HGVs to be more severe than the typical frontal impact covered in regulations and ratings. We also found limitations in some restraint systems when it comes to optimally protecting the car occupants. We are currently running analyses and plan to present further related findings in 2023.
- E-scooters have become popular in many cities but pose new traffic safety challenges with increasing numbers of accidents. However, crash and injury causation are poorly understood since riding data preceding crashes is lacking. In 2022, we concluded a project together with mobility company Voi, funded by the Swedish Innovation Agency Vinnova, where we collected naturalistic riding data from shared e-scooters. Subsequently, we are engaging with even more partners to develop models on rider behavior to guide intelligent transport systems and connected automated vehicles in their interaction with e-scooterists.

We also engage and collaborate with a number of universities. At Ohio State University's annual Injury Biomechanics Symposium, Autoliv held several presentations and engaged

with students and graduates to promote further interest in vehicle safety. Autoliv India runs incubators at several Indian technical colleges to engage with students in finding new solutions for safety and mobility as well as to build the perception of Autoliv as an attractive employee. Going forward, we are partnering with Chalmers University of Technology and AB Volvo to design and evaluate a prototype for a safer truck front-end.

Read more about our R&D agenda and research collaborations under Innovating for a Safer Society, p. 28-29.

Community engagement

We regularly engage with both national authorities as well as local communities and stakeholders where we operate to contribute to road safety awareness. As an example, in Japan, close to 60 children and their families were invited to the annual event at Autoliv's tech center in Tsukuba to learn from Autoliv employees about road safety awareness. In Romania, Autoliv and the road safety association E.R.A and emergency services hosted presentations at several high schools on the topic of road safety and vehicle safety systems, and provided first aid training. In China, Autoliv together with Polestar launched a social media campaign aimed at promoting child road safety.

According to research¹, seatbelts alone reduce occupant fatalities by 45%, frontal airbags alone by 14% and both together reduce fatalities by 51%.

1) Kahane, 2015

Ambitions:

Zero accidents
Embrace inclusive ways of working

A Safe and Inclusive Workplace

Targets:

0.35 Incident Rate by 2023	3.8 Severity Rate by 2023	95% of senior and mid-level management trained in unconscious bias by 2023	Year-on-year improvement in Employee experience	22% women in senior management by 2023
2022 Outcome: 0.32	2022 Outcome: 3.31	2022 Outcome: 52%	2022 Outcome: Improvement	2022 Outcome: 18%

Health and Safety

Our ambition and approach

Autoliv is committed to providing safe and healthy working conditions for our employees and contractors. We believe that work-related injuries and illnesses are preventable and continually strive to eliminate all workplace accidents. The responsibility for health and safety (H&S) starts with senior management. All employees share a responsibility for identifying and eliminating unsafe conditions and behaviors, and speaking up.

Health and safety management

We strive to make H&S an integral part of everyday business by integrating H&S into our production system and at the initial stage of all our projects and processes that may affect the working environment of our employees.

All production sites are required to implement Autoliv's health and safety management system (HSMS), which is aligned with ISO 45001 requirements. The HSMS is supported by

local leadership teams who encourage operators and visitors to engage in and proactively speak up about health and safety concerns and to take responsibility for safety. Implementation of the system is monitored through internal audits and external certification audits.

The cornerstone of our HSMS is the Hazard Identification Risk Assessment. These assessments establish the principles and internal standards by which H&S activities and operations are managed, provide a factual basis for identifying significant hazards and risks, and support in implementing continuous improvement activities to eliminate or mitigate these hazards and risks.

As part of an increasing focus on accident prevention, we are expanding the use of leading H&S indicators. In 2022, we added identified unsafe acts and conditions to our monthly management reporting. On our lagging KPIs we significantly improved our performance compared to 2021.

Autoliv's H&S work principles

Leadership commitment

Leaders at all levels of the organization are actively involved in creating a behavior that supports and promotes strong H&S performance and continuous improvement.

Employee involvement

Employees are actively engaged in all aspects of H&S performance, including establishing goals, identifying and reporting hazards/risks, investigating incidents and tracking progress.

Work safety is a condition for employment

Every employee is responsible for contributing to their own workplace safety.

Recognition and control of risks

Processes and procedures are implemented to proactively identify, prevent, reduce and/or control potential hazards/risks.

Continuous improvement

Processes and procedures are implemented to monitor H&S, verify implementation, identify defects and provide opportunities for improvement.

H&S training and awareness building

During 2022, H&S continued to be a key topic at EMT and Divisional Management Team meetings. Leadership safety training continued to be deployed throughout the year, and the plan is for all managers to undergo training during 2023.

All employees working in production are continuously trained in relevant H&S topics, and H&S is included as a mandatory item in daily team meetings. In addition, they are trained in the use of on-site H&S reporting tools and empowered to immediately stop production if an actual or potential serious risk is identified.

Focus on high-risk activities

Despite a positive trend in the number of recordable injuries, serious and even fatal accidents occur in our operations. During the year, we began implementing common standards for high-risk activities such as working at heights. Going forward, these standards will form the foundation of our H&S assessments.

COVID-19 response

During the year, we saw the effects of the pandemic subside across the organization. Our "Smart Start Playbook", which was developed in 2020 to handle the effects of the pandemic, was further developed to also include exit strategies for returning to normal operations.

Inclusion

Our ambition and approach

Inclusive ways of working are an asset and a fundamental part of the Autoliv Key Behaviors that were launched in 2021. Including a multitude of perspectives is an integral part of successful decision-making in all parts of the organization and helps drive innovation and create long-term sustainable shareholder value in a rapidly changing industry. We believe that everyone should be respected and treated fairly, and we are committed to providing an inclusive and diverse workplace where everyone can be themselves, deliver results and bring their authentic selves to work.

Activities during the year

In 2021, we defined our company-wide inclusion approach and set the first inclusion targets. During 2022, we increased our activities and focus to deliver on our targets and action plan, including a focus on increasing the share of women in management. This included steps to create a more diverse candidate base, and the implementation of scientific selection methods to increase objectivity in both internal and external recruitment. The share of women in senior management improved slightly from 2021. We also continued unconscious bias training for senior and mid-management to enhance managers' insight and ability to take diversity into account in everyday work.

Measuring inclusion

The company-wide quarterly employee survey includes statements that measure key aspects of an inclusive work environment: whether employees feel that they can be themselves at work ("Authenticity") and whether they have the same opportunity to advance in the organization ("Perceived fairness"). The scores showed overall consistent results compared with 2021, with a slight improvement in authenticity (82% favorable) and an unchanged score for perceived fairness (73% favorable). There was no significant difference between employee categories. Overall, the results were on a par with or above the external benchmark.

For more information about employee development, see Building a Winning Team on p. 30.

Including a multitude of perspectives is an integral part of successful decision-making in all parts of the organization and helps drive innovation and creates long-term sustainable shareholder value in a rapidly changing industry.

Ambitions:

Carbon neutrality

in own operations **by 2030**

Net-zero emissions

across our supply chain **by 2040**

Climate Action

Targets:

Carbon neutrality
in own operations
by 2030

2022 Outcome:
430 kton CO₂e

12%
reduction in energy
intensity **by 2023**

2022 Outcome:
5% above 2018 baseline

Year-on-year
**reduction
in waste**
Continuous

2022 Outcome:
8% Increase from previous year

Our ambition and approach

We are committed to operating our business in an environmentally sustainable manner, taking into account our environmental impact throughout the life cycle of sourcing, design, production and end of life. Our key environmental impacts are greenhouse gas (GHG) emissions, energy use, waste generation and water use. With particular emphasis on climate action, we actively engage with customers, suppliers and other stakeholders to take on the decarbonization challenge across the value chain and drive sustainable mobility.

Updated climate strategy

In 2021, we launched an updated climate strategy including new long-term climate ambitions:

- **Carbon neutrality in own operations by 2030**
- **Net-zero emissions across our supply chain by 2040**

These industry-leading climate ambitions are aligned with a 1.5°C trajectory and position us as the supplier of choice

for the most progressive customers, helping to ensure our competitiveness now and in the future. In addition to these ambitions, we have adopted Science Based Targets for 2030 covering our own operations (Scope 1+2) as well as our supply chain (Scope 3 upstream). The targets are available on the SBTi website.



Our GHG footprint

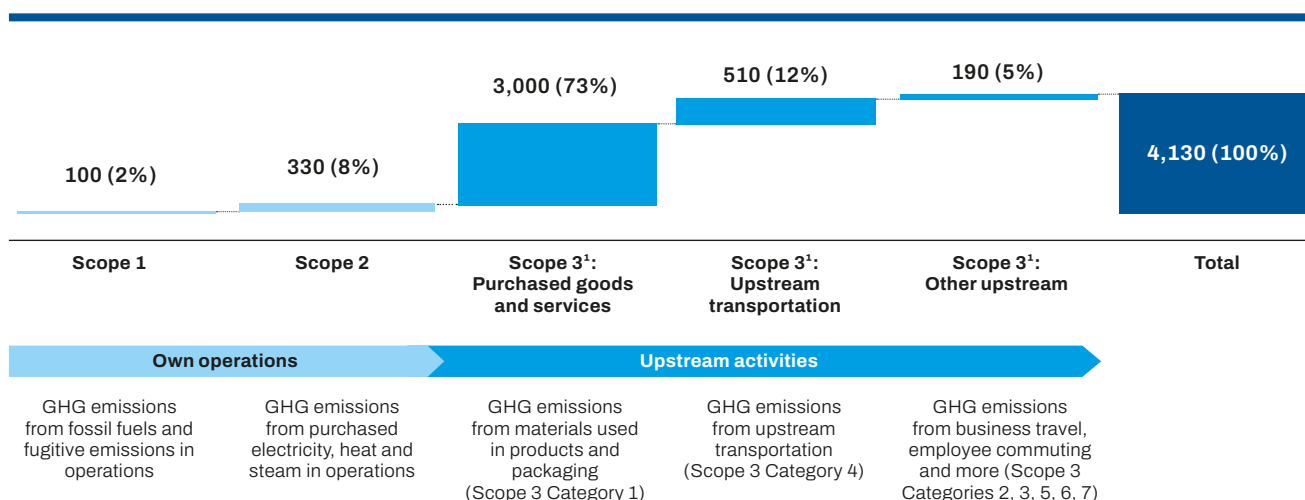
To fully understand our GHG footprint as well as key climate-related risks and opportunities, we carried out an extensive value chain GHG footprint assessment and scenario analysis in 2021. The assessment was carried out in accordance with the GHG Protocol Scope 3 Calculation Guidance. Scope 1 and 2 emissions were calculated based on actual operational data such as energy consumption, while Scope 3 emissions were modelled based on actual and estimated sourcing data and generic emission factors. The assessment showed that for the emissions covered by our long-term ambitions, materials

used in our production (in particular steel, textiles and other plastics, and magnesium) were the largest contributors, followed by emissions from logistics and electricity used in our own operations.

Downstream Scope 3 emissions, in particular use-phase emissions, constituted the largest share of the total GHG

footprint. Since we consider our possibility to reduce downstream Scope 3 emissions to be greatly limited (such reductions are mainly driven by our customers' work on electrification), they are excluded from our long-term ambitions and Science Based Target covering Scope 3.

Autoliv's GHG footprint across own operations and our supply chain¹ 2022 (kton CO₂e)



1) Considering the challenges related to accurately modelling upstream Scope 3 emissions, such as the accuracy of historical data and the availability and applicability of emission factors, actual upstream Scope 3 emissions may differ materially from those modelled. The modelling primarily aims to identify the major sources of Scope 3 emissions across the value chain, which supports Autoliv in developing specific activities for improvement and implementing the relevant measures. Autoliv aims to, over time, increase the accuracy of reported upstream Scope 3 emissions by addressing material uncertainties. The illustration above does not include modelled downstream Scope 3 emissions, which include emissions from the use phase of vehicles where Autoliv's products are installed.

Autoliv's climate program

Based on the results of the GHG footprint assessment, we have designed a climate program organized into a number of operational initiatives focusing on the most important decarbonization levers or value creation and enabling activities. A number of cross-cutting initiatives related to governance,

performance measurement, business strategy integration, risk management and competence development support the operational initiatives. Guided by our 1.5°C aligned long-term ambitions, the climate program represents Autoliv's low-carbon transition plan.

Low-Carbon Supply Chain	Low-Carbon and Efficient Operations	Low-Carbon Product Offering
Low-carbon electricity in the supply chain Low-carbon material sourcing Low-carbon logistics	Energy and resource efficiency Phase-down of natural gas equipment Elimination of fugitive emissions Renewable energy for operations	Low-carbon product design Low-carbon sales strategy
Cross-cutting initiatives		
Program governance and performance measurement	Business strategy integration	Risk management
		Organization and competence development

The most impactful decarbonization levers identified within our own operations include:

- Transitioning to low-carbon electricity at our facilities using a mix of on-site solar generation, long-term Power Purchase Agreements (PPA), Renewable Energy Certificates (REC) and Energy Attribute Certificates (EAC)
- Continued focus on energy and materials efficiency
- Replacing current fossil-fuel equipment such as natural gas furnaces with electric alternatives
- Phasing out fugitive emissions

Key initiatives that we intend to implement to reach net-zero emissions across our supply chain include:

- Transition to recycled, bio-based and other low-carbon materials in our products
- Requiring our suppliers to use low-carbon electricity in their production
- Reducing the GHG footprint of our logistics through route, capacity and footprint optimization as well as a shift towards low-carbon transportation modes and vehicles

Below is a summary of some of the work and key achievements within the program during the year.

Low-carbon supply chain

During the year, we continued engaging with a broad range of direct material suppliers to systematically review options for increasing the use of bio-based, recycled and low-carbon materials in our products. One example is the partnership between SSAB and Autoliv first launched in 2021 to research and develop fossil-free steel components for automotive safety products. This partnership aims to allow us to become the first automotive safety supplier to produce products using fossil-free steel.

To better understand our direct material suppliers, we carried out a large-scale climate survey. The survey covered areas such as whether suppliers are able to quantify their emissions, whether they are using renewable energy and whether their targets are aligned with Autoliv's net-zero ambition. The results showed that, overall, there is a large spread in suppliers' readiness with larger suppliers generally being better prepared. The outcome of the survey will be reflected in climate-related supplier criteria.

Low-carbon and efficient operations

The renewable energy strategy expanded to cover both short-term and long-term actions for all divisions. With a focus on electricity, we expanded purchasing of renewable electricity instruments and began planning for long-term PPAs in several markets. In 2022, 13% of our total electricity consumption came from renewable instruments, up from 1% in 2021. In addition to renewable electricity instruments, many sites have installed or are in the process of installing on-site solar generation capacity. While still representing less than 1% of our total energy consumption, we are working to grow this share

significantly over the coming years. In total, we estimate that renewable energy helped us reduce our GHG emissions by almost 40 kton compared to if we had used non-renewable sources. Despite an increase in total energy consumption, we reduced our Scope 1+2 emissions compared to 2021.

As part of our Green Factory Program, manufacturing facilities regularly conducted energy audits to find opportunities to improve their energy efficiency. Energy efficiency initiatives during the year targeted areas such as air compressor leaks, waste heat recovery, installing LED lighting and replacing older equipment with new, more efficient equipment. To further best practice sharing, one of our production sites in France carried out an extensive energy monitoring project, to be rolled out to more sites in 2023.

We launched a concrete action plan to phase out the remaining use of SF₆, over the next few years. SF₆, which is used in steering wheel production, is our largest source of fugitive emissions, making up around 8% of Autoliv's own (Scope 1+2) emissions.

Low-carbon product offerings

Our ambition is to develop attractive, low-carbon product offerings to support our customers in their transition to electrified, zero-emission vehicles. We see constantly increasing ambition levels from our customers, and therefore also increasing requirements on us as a supplier.

During the year, all product lines started development on action plans for net-zero aligned product roadmaps and we continued our collaboration with Polestar to create the first climate-neutral car. We continued our work to evaluate our products' overall environmental footprint throughout their life cycle. These life-cycle assessments (LCAs) help prioritize actions in product development such as light-weighting and insourcing of low-carbon materials. The LCAs also allow us to proactively engage with customers, highlighting the carbon footprint of our products and how embedded emissions can be reduced. We already offer our customers specific products that support their carbon footprint reduction strategies, such as products with lower weight and higher content of recycled non-ferrous metals and low-carbon polymers.

Cross-cutting initiatives

During the year, targeted climate training for top management was carried out in all divisions and corporate functions. This training will continue to be rolled out in 2023 to all mid-level management and employees. In addition, certain functions such as supply chain management and sales teams received further in-depth training on relevant topics.

Our CAPEX investment guidelines were updated with specific climate guidance, to ensure our investments are aligned with our long-term climate ambitions. Investments covered include for example installation of solar panels and replacement of fossil fuel equipment with electric alternatives. The guidelines also specify exclusion criteria for investments that could lead to increased GHG emissions.

To strengthen our capacity for accurate GHG accounting and forecasting, we initiated a project to implement a comprehensive GHG accounting solution covering both our

own operations and supply chain activities such as materials and logistics sourcing. We expect to have the solution in place in 2023.

Read more about climate-related governance and risk management in the TCFD disclosure, p. 46-47.

Waste and circularity

We approach waste management through the principle of Reduce-Reuse-Recycle. As part of the EMS and our Q5 quality program, we continuously look for opportunities to reduce the amount of waste generated in production.

In 2022, we launched initiatives such as reusing magnesium scrap from our own operations, thereby greatly increasing the share of recycled magnesium in armatures. Other initiatives for reuse and recycling included recycling scrap airbags and selling the materials, such as metal, fabric and plastic, to local recycling companies. Another example came from the operations in Romania, where webbing, airbag textiles and steering wheel leather were turned into bags available for Autoliv employees to purchase from our internal webshop. Several sites also use reusable packaging.

Our production facilities are continuously researching options to direct their waste away from landfill. The rate of reuse, recycling and energy recovery increased to 90% (89% in 2021) of total waste reported.

In 2023, we will continue to develop and strengthen our approach to circularity.

Environmental management

Autoliv's environmental management system (EMS) emphasizes continuous improvement and is aligned with ISO 14001 requirements. The EMS establishes the requirements for a standardized approach to environmental management, including identification of material environmental aspects, objective setting, competence development, performance follow-up and standardized reporting. At year end, 97% of all manufacturing facilities (89% in 2021) were externally certified in accordance with ISO 14001.

As part of our Green Factory Program, manufacturing facilities regularly carry out assessments covering energy use, GHG emissions, water and waste to assess their performance and identify opportunities for improvement.

Materials management

Materials management is an important part of our product development process, from identifying materials and their composition for new products to reporting on the material composition of our parts supplied to customers. We have clear requirements for reporting the material composition of our purchased and supplied parts and the restrictions to which certain chemical substances will be subject. Autoliv's related standard for chemical substance use restrictions is regularly reviewed and updated to meet the latest legal and customer requirements. We continuously follow up with our suppliers to phase out chemical substances according to the latest legal requirements. This year, special efforts were devoted to phasing out hexavalent chromium in the chrome coating process for plastic and steel parts.

Autoliv Collaborates with Polestar on Groundbreaking Climate-neutral Car

The "Polestar 0" project unites companies across the automotive supply chain to leverage innovation and collaboration to address the climate crisis and change the view of how to manufacture cars in a sustainable way. The collaboration is in line with Autoliv's commitment to be the first automotive safety supplier to become carbon neutral in its own operations by 2030 and aim to achieve net-zero emissions across its supply chain by 2040.

Autoliv and Polestar intend to research and develop technology aimed at finding climate-neutral solutions and innovations related to automotive safety such as pyrotechnics, textiles, and new generations of materials for airbags and seatbelts.

"We are happy and proud to join forces with Polestar. To reach our ambitious climate targets, we need to collaborate across the value chain. We are well-positioned to continue to support our partners and customers in achieving their sustainability goals," says Mikael Bratt, President and CEO of Autoliv.

"It was clear from the start that this is not a solo mission and we are very excited to present such a strong lineup of interested partners, all leaders within their fields, including Autoliv. We are leveraging innovation and collaboration to address the climate crisis," says Thomas Ingenlath, Polestar CEO.

"It was clear from the start that this is not a solo mission and we are very excited to present such a strong lineup of interested partners."

THOMAS INGENLATH,
CEO POLESTAR



TCFD Disclosure

Autoliv sees the management of climate-related risks and opportunities as a key component of ensuring long-term business success. This disclosure, aligned with the Task Force on Climate-Related Financial Disclosures (TCFD) recommendations, aims to provide an overview of Autoliv's work.

For more information on GHG emissions, see page 55.

Governance

The Board of Directors is ultimately responsible for the oversight of sustainability-related matters, including climate change, and has delegated certain responsibilities to its committees. The Board of Directors and the Nominating and Corporate Governance Committee (NCGC) receive regular updates on climate-related matters and performance. In 2021, the Board of Directors endorsed Autoliv's long-term climate ambitions as well as the strategic direction for reaching the ambitions. Throughout 2022, the Board and NCGC received updates on our progress in the climate program as well as our plans for 2023.

The Executive Management Team (EMT) is responsible for implementation of sustainability-related matters, including climate change. The Sustainability Board, which consists of the CEO and several EMT members, has overall operational oversight of Autoliv's climate program. Other relevant company Boards consisting of members of management, such as the Industrial & Product Board, Innovation Board and Commercial Board, focus on specific climate program initiatives. Performance against climate-related targets is reviewed regularly by the EMT, divisional and other functional management teams and followed up in monthly business reviews. The underlying governance principle of the climate program is close integration into existing governance structures.

Supported by the VP Sustainability, the Executive Vice President HR & Sustainability, is ultimately responsible for the overall program definition and governance, and for ensuring implementation progress.

For more information about sustainability governance, see p. 36-37.

Strategy

Scenario analysis

During 2021, as part of the development of the updated climate strategy, we carried out our first climate scenario analysis. The analysis, which covered both transition and physical risks, was based on a 2°C (equivalent to RCP 4.5) scenario and a 3-4°C (equivalent to RCP 8.5) scenario. Transition risks were assessed on a 2030-2040 timeframe, while physical risks were assessed on a 2050 timeframe.

From a financial impact perspective, the most material transition risks identified were:

- the risk of a global decrease in overall vehicles sales
- increasing prices for raw materials with a large carbon footprint as a result of various carbon pricing mechanisms
- potential revenue loss if Autoliv fails to meet increasingly strict supplier requirements from OEMs who themselves have set strict GHG emissions reduction targets

The most material physical risks identified, generally connected to a 3-4°C scenario, were factors that would lead to production disruptions. These include wildfires, flooding and extreme heat. These risks were seen as particularly high in countries and regions such as the Southwest US, Mexico, India and China. These risks are also expected to impact suppliers and customers in these regions.

The most material opportunities identified pertained to building a strong position among climate-progressive OEMs including EV manufacturers as a supplier of low carbon components as well as realizing opportunities to increase operational energy and materials efficiency.

Strategy and business integration

Climate change is integrated into Autoliv's business strategy, which is cascaded through established steering mechanisms such as annual business planning and target setting.

To realize the key climate-related business opportunities, we are in the process of developing low-carbon product offerings and forming partnerships with customers to help them reduce the carbon footprint of their products. In addition, efforts to increase the energy and materials efficiency of our operations will support in reducing related OPEX. As part of our climate transition plan, we aim to further develop and use scenarios as a supporting tool in quantifying the financial impacts of climate-related risks and opportunities, including setting a price on carbon and other climate-related financial KPIs.

Autoliv's strategic plan was updated in 2022, covering the years 2023-2025. Climate is included as one of the focus areas in the strategic plan. During 2022, we also focused on integrating climate considerations into the company's strategic product planning process and other key processes, such as CAPEX decisions.

Risk management

In 2021, climate-related risks were identified and assessed as part of the scenario analysis. Going forward, they will be

integrated into the Enterprise Risk Management (ERM) process. For more information about ERM and management of sustainability risks, see page 36.

Transition risks are generally considered mitigated through continuous legal and market intelligence reviews, sales forecasting and stakeholder (e.g. customers and investors) engagement. Physical risks are generally considered mitigated through impact assessments before production sites are planned as well as ongoing business continuity management.

Metrics and targets

In addition to Autoliv's long-term ambitions and Science Based Targets, the climate strategy includes a number of more detailed KPIs and related targets. These cover the most important emissions reduction levers such as sourcing of low-carbon raw materials, low-carbon logistics and a transition towards renewable electricity use.

In 2022, GHG emissions from own operations (Scope 1+2) was added as a performance component to the long-term equity incentive program. The program covers around 300 participants, including the CEO and all EMT members.

Climate risk assessment		
Transition risks	Most material risks	Potential financial impacts
Policy and legal	Carbon pricing mechanisms leading to increasing prices for raw materials with a large carbon footprint	Increased OPEX
Technology	Decrease in overall vehicle sales	Loss of revenue
Market	Higher demand for renewable electricity and low-carbon raw materials	Increased OPEX
Reputational	Increasing stakeholder requirements or expectations on Autoliv to aggressively reduce GHG emissions in its own operations and/or supply chain	Loss of revenue, reduced access to capital
Physical risks		
Acute/short-term	Wildfires Extreme heat Flooding	Loss of revenue related to production disruptions
Chronic/long-term	Extreme heat Water stress	Costs related to the need of relocating production

Responsible Business

Ambitions:

Proactively prevent corruption and other unethical business practices

Respect human rights

Manage supply chain sustainability risks

Targets:

100%

in target group completed anti-corruption training
Continuous

2022 Outcome:
>95%

100%

in target group completed anti-trust training
Continuous

2022 Outcome:
99%

100%

in target group Code of Conduct certified
Continuous

2022 Outcome:
99%

100%

direct material suppliers sustainability audited
by 2022

2022 Outcome:
98%

100%

direct material suppliers respond to conflict minerals survey
Continuous

2022 Outcome:
89%

Our Responsible Business strategy

Responsible business is a fundamental element of Autoliv's sustainability framework. To recruit and retain the best talent and to build enduring relationships with our customers and suppliers, it is essential that Autoliv is known for the quality of its conduct as well as its products and services. Through our approach to responsible business, we work to continually strengthen how we:

- Proactively prevent corruption and other illegal or unethical business practices wherever we operate
- Respect human rights across our value chain
- Manage sustainability risks across our supply chain

Code of Conduct

Saving Lives with Integrity

Autoliv

Autoliv's Integrity Check

If you answer any of these questions with a “no” or “I’m not sure”, pause and seek additional guidance.



Compliance and Corporate Integrity

Saving Lives with Integrity: Our Code of Conduct

Our Code of Conduct is at the core of responsible business, guiding our specific compliance and integrity commitments as well as framing the Key Behaviors that run through everything we do.

The revised Code was launched in January 2022 and rolled out through leader-led discussions throughout the year. Over 600 leaders from different parts of the company conducted these sessions with their teams, allowing the teams to discuss the role of our Code, our Integrity Check, what we should expect from each other, and speaking up. To continue to embed the Code as a tool to both protect and enable Autoliv and our employees, the Code launch sessions were supplemented by team-based discussions focused on different aspects of our Code and responsible business approach. These discussions will continue during 2023 as a complement to our more formal e-learning program available to all employees.

Each year, all Autoliv employees in a leadership role must complete a Code of Conduct certification. The certification requires the disclosure of known violations of the Code and an acknowledgement that the leaders are aware of and promote the Code to their teams. At year end, 99% of target group employees had completed certification.

Anti-corruption

At Autoliv, we compete vigorously and effectively while always complying with applicable anti-corruption laws. We have zero tolerance for any form of corruption in our business dealings and expect the same standards from our business partners. We perform due diligence on all high-risk third-party relationships and apply risk-based controls to support our third parties in applying our anti-corruption commitments. We use a combination of face-to-face workshops and e-learning to maintain employees' anti-corruption awareness and knowledge for certain employees within functions with increased risk exposure. Anti-corruption training is mandatory for selected employees in functions with a high risk exposure. During 2022 we focused on revising our anti-corruption e-learning, which will be launched in 2023. Based on 2021 figures we estimate that over 95% of target group employees have completed anti-corruption training.

Antitrust

We will always thrive best in fair and open markets. Therefore, we rigorously follow all competition and antitrust laws that apply to our operations. We regularly offer training and communication about how we compete fairly. To provide further clarity regarding our Antitrust and Competition Policy, we provide antitrust “Dos and Don’ts” guidelines with practical guidance. In 2022, we developed a new Competition and Antitrust e-learning, to be rolled out to selected employees in functions with a high risk exposure in 2023. In addition to the e-learning, we developed facilitator-led trainings tailored to fit different target groups such as Sales.



Speak up.

Speaking Up @Autoliv:

“Any communication or discussion with the intent to bring positive change, show encouragement or highlight an issue for improvement”.

Speaking Up

The more colleagues feel safe to speak up within and across teams, the more ideas we will generate and the more problems we will catch early. This is why at Autoliv we have embraced a broad definition for speaking that covers *“any communication or discussion with the intent to bring positive change, show encouragement or highlight an issue for improvement”*.

To help ensure that our broad definition of Speaking Up is consistently referenced and promoted across workstreams and strategic initiatives, implementation of the Speak Up policy is the joint responsibility of several functions: Compliance & Corporate Integrity, Health & Safety, Quality, and HR.

Although we believe this broader definition will benefit our business in all aspects of speaking up, we make it clear that Autoliv employees are responsible for immediately reporting suspected or known violations of the Code of Conduct, the law or Autoliv’s policies. All employees are frequently informed of the multiple channels available for raising such issues. In most cases, this should be to their manager or a member of local management. When this is not possible (for any reason), colleagues in HR, the Legal Department, or Compliance Officers are always available, or the Autoliv Helpline can be used.

Awareness of Speak Up channels and confidence in speaking up without fear of retaliation is measured in the annual and quarterly employee surveys. 84% of employees who participated in the 2022 annual employee survey felt that they can raise or escalate problems without fear of negative consequences, up from 83% in 2021. While many teams report that they feel confident in speaking up, we know this sentiment is not yet universal in all parts of Autoliv. The Code of Conduct and Speak Up policy firmly state that no employee or third party should be adversely affected for reporting in good faith or for refusing to carry out a directive believed to constitute a violation of the Code or other Autoliv policies, laws, or regulations.

Autoliv Helpline

The Autoliv Helpline is a third-party operated reporting service available to all employees as well as third parties. Reports can be made anonymously (where allowed by law) and/or confidentially in the language of any country where Autoliv operates. All reports are investigated to determine whether there is any violation of the law, the Code or other Autoliv policies.

In 2022, a total of 318 reports were received by the Compliance team. Close to 90% were received via the Helpline reporting system (phone or online) and the other reports were raised internally, meaning reported directly to management, HR, Legal or Compliance teams. Of the reports received, 77% were opened for investigation. Of the investigations closed in 2022, 32% of the allegations or cases were substantiated or partially substantiated. Compared to previous years, 2022 saw an increase in the number of reports related to inappropriate behavior, labor issues and conflict of interest.

Data privacy

During 2022, we strengthened our internal communications on the importance of good data privacy habits and the duty of care we all have to protect personal data. Workshop training was carried out with leaders and managers and will continue during 2023. The data privacy team continued implementing the improvements identified through review and benchmarking of the program, as well as applicable legal requirements.

Tax policy

At Autoliv, tax planning is carried out in compliance with all relevant laws, disclosure requirements and regulations, while safeguarding shareholder interests and the Autoliv brand. All tax planning must be in line with Autoliv’s business purpose and no baseless organizational structure is permitted.



All Autoliv affiliates are required to pay all tax obligations and meet relevant payment deadlines, to fully comply with all relevant tax laws and accounting rules and regulations in the tax jurisdictions in which the business operates, and to be open and transparent with tax authorities about their tax liability. Where disputes arise, Autoliv will proactively seek to work cooperatively with full transparency.

Human rights

Human rights are an integral part of Autoliv's sustainability agenda and cut across all sustainability focus areas. We are committed to respecting the UN Universal Declaration of Human Rights. Key human rights commitments include:

- Our products save lives, and we need to ensure the quality and safety of our products as they never get a second chance
- We are committed to offering a safe and inclusive workplace and respecting all other labor rights
- Our climate agenda contributes to limiting global warming to 1.5°C, thereby mitigating the most severe impacts on societies
- Our supply chain sustainability risk management processes consider human rights risks and impacts

Human rights commitments are included in our Code of Conduct and our Supplier Code. These Codes are supported by topic-specific policies that cover human rights, such as our Health & Safety Policy, Respect in the Workplace Policy and Conflict Minerals Policy. Implementation of our commitments is ensured through management attention, management systems, standards, risk assessments, other tools and training. During 2023, we aim to further develop our human rights due diligence processes.

Human rights are also a cross-cutting theme in our community engagement activities. One such example is our and other large Swedish companies' long-standing collaboration with the NGO Pratham to ensure effective education for 30,000 children in Assam in India.

Labor rights

Autoliv is committed to offering fair terms and conditions of employment. These commitments extend across our supply chain. Our talent development strategies and employment policies support the International Labour Organization's Fundamental Principles and Labor Standards. We are committed to:

- Providing fair and equitable wages, working hours, benefits and other conditions of employment in accordance with applicable laws
- Recognizing and respecting employees' right to freedom of association and collective bargaining
- Providing decent working conditions
- Prohibiting child, forced and bonded labor
- Promoting a safe workplace free from any form of discrimination or harassment

Autoliv is committed to engaging in open and transparent dialog with all employees and where applicable with representatives of organized labor groups and unions. We recognize and respect employees' rights to freedom of association and collective bargaining. In the majority of the countries where we operate, all or part of our workforce is covered by a collective bargaining agreement. In addition, we have a number of different mechanisms through which employees can bring up topics with management. These include Autoliv's Speak Up channels (including the Autoliv Helpline), an employee suggestion program, local health and safety committees,



and operational committees. The major unions representing Autoliv employees in different regions are disclosed as part of the 10-K filed with the SEC.

Supply Chain Sustainability

Our ambition and approach

Through responsible sourcing practices and supplier collaboration, Autoliv aims to create positive social and environmental value across our supply chain. We expect suppliers and third parties to enact the same standards and processes as we do when it comes to managing key impacts and risks such as greenhouse gas emissions, labor rights, and anti-corruption.

To manage our global supply chain in a responsible manner, we focus on integrating sustainability into relevant supply chain management processes. Suppliers are monitored in a live risk tool covering such factors as natural disasters, financial status, reputation, cybersecurity risks, and responsible sourcing practices. Autoliv's lead buyers are updated regularly with information related to their suppliers, allowing them to take immediate action when necessary.

While our main focus is on direct material suppliers, during 2022 we continued to expand the scope of our supply chain sustainability risk management to indirect suppliers as well as strengthened our third-party compliance due diligence processes. A revised supplier escalation model was integrated including protocols and timing for the appropriate escalation of potential supply chain risks. Our ap-

proach is to work with suppliers, to the extent possible, to resolve issues before determining to potentially phase out the supplier.

Further information related to supply chain risks is available in the 10-K filed with the SEC.

Supplier Code and Supplier Manual

We expect our suppliers to comply with the laws and regulations in the areas where they operate and to follow Autoliv's policies and procedures, including our Standards of Business Conduct and Ethics for Suppliers (Supplier Code). In situations where an Autoliv requirement may be in conflict with local laws or regulations, we expect our suppliers to follow the most stringent requirements.

The Supplier Code conveys our expectation that suppliers will uphold our social, ethical and environmental standards in conducting their businesses in areas including human rights and working conditions, environmental protection, and business conduct and ethics. For direct material suppliers, the Supplier Code is included in the Autoliv Supplier Manual (ASM). All direct material suppliers are required to acknowledge their compliance with the ASM as part of our general terms and conditions and by signing a separate acknowledgement letter for the ASM. In the case of indirect suppliers, a reference to the Supplier Code is included in the general terms and conditions attached to purchasing orders. In 2022, the Autoliv Supplier Code was substantially revised with strengthened requirements in particular related to conflict minerals and environmental impacts.

Supplier audits

Autoliv has dedicated teams responsible for the quality management of our supply base, including mandatory steps such as pre-qualification audits for new direct material suppliers. Sustainability criteria are included as a module in these pre-qualification audits and must be met before becoming an Autoliv supplier. These audits ensure that our suppliers adhere to Autoliv's standards as well as to applicable local laws and regulations, and establish a process for working with suppliers that fail to meet our policies and standards. If audited suppliers don't meet our requirements, an internal escalation process is in place to ensure that non-conformities are corrected.

At year-end, 98% (81% in 2021) of active direct material suppliers within audit scope had undergone a sustainability audit. Carrying out on-site audits remained a challenge due to COVID-19 restrictions that prevented physical visits at some suppliers. In these cases, remote audits were carried out according to Automotive Industry Action Group (AIAG) guidelines. We continued to develop our supplier sustainability audit criteria, process and capability to follow up, and provided further guidance to our supplier quality auditors who perform sustainability audits.

Conflict minerals

Pursuant to SEC rules, conflict minerals include certain minerals (tin, tantalum, tungsten and/or gold) that originated in the Democratic Republic of Congo or an adjoining country and are sold to benefit groups financing armed conflicts in those regions. We recognize the need to end the illegal extraction and trade of natural resources, and the human rights violations, conflicts and environmental degradation that result from this trade. Our Conflict Minerals Policy provides further clarification regarding conflict minerals, and its principles are incorporated into our Supplier Manual.

We have designed our conflict minerals approach in accordance with the related OECD Due Diligence Guidance, specifically as it relates to our position as a downstream purchaser. In order to comply with the SEC's conflict minerals rules and regulations and to ensure responsible sourcing of components, parts or products containing conflict minerals, we continuously review our supply chain and work with our suppliers to identify and improve the traceability of potential conflict minerals. We support industry initiatives, such as the Responsible Minerals Initiative (RMI), and utilize external expert guidance to validate that the metals used in our products do not contribute to conflicts and come from sustainable sources. In cases where we find potential risks and conflicts with smelters identified within our supply chain, we take immediate action to mitigate the potential risks. In some cases, this means to discontinue sourcing from suppliers that are in violation of our requirements to ensure sourcing from designated RMI Active or conformant suppliers.

To ensure our understanding of the potential use of conflict minerals, we have implemented an annual conflict minerals campaign covering our direct material suppliers. The scope of the annual campaign includes all direct material suppliers that have conducted business with us during the current calendar year and have listed gold, tin, tantalum, or tungsten ("3TG") in their Bill of Materials. This information is extracted from the automotive industry standard reporting platform IMDS. The response rate to the latest completed campaign was 89%. Most non-responding suppliers were customer-directed suppliers. We are working with these customers to mitigate this issue for future conflict minerals campaigns. We publish an annual report on our conflict minerals campaign on our website.

During the year, we also strengthened our processes related to working together with suppliers to better trace cobalt and mica used in components supplied to us.



Creating Shareholder Value

By ensuring customer satisfaction, maintaining tight cost control and developing new products, we generate cash for long-term growth, financial stability and competitive returns to our shareholders.

Autoliv has a strong cash flow and cash generation focus. Our operating cash flow has always exceeded our capital expenditures. On average, our continuing operations excluding antitrust payment in 2019 have generated \$793 million in cash per year over the last five years, while our capital expenditures, net, have averaged \$448 million per year during the same period.

Capital efficiency

Our strong cash flow reflects both Autoliv's earnings performance and our capital efficiency. During 2022, our capital turnover rate, meaning our sales in relation to average capital employed, increased from 2.2 to 2.4 times, slightly better than our 5-year average capital turnover rate of 2.2.

Our cash flow model

When analyzing how best to use each year's cash flows from operations, Autoliv's Executive Management and the Board of Directors use a model for creating shareholder value that considers variables such as the marginal cost of borrowing, the return on marginal investments and the price of Autoliv shares. When evaluating the various uses of cash, the need for flexibility is weighed against acquisitions and other potential uses of cash.

Investing in operations

To create long-term shareholder value, cash flow from operations should only be used to finance investments in operations until the point when the return on investment no longer exceeds the cost of capital. Our historical weighted average cost of capital has been approximately between 10% and 13% in the past ten years. Autoliv's pre-tax return

on capital employed has generally exceeded this level, except during the COVID-19 pandemic in 2020. During the last five years, the return on capital employed has varied between 10% and 20%, i.e. about one to two times the pre-tax cost of capital. In 2022, \$485 million was reinvested in the form of capital expenditures, net. This corresponds to 68% of the year's operating cash flow of \$713 million. Capital expenditure, net, was 34% higher than depreciation and amortization as we invest in footprint optimization, flexible automation and capacity increases to support the organic growth we expect from executing on our strong order book in the coming years.

Acquisitions, divestments and investments in assets

In order to accelerate company growth and create shareholder value over time, we could use some of the cash flow generated for acquisitions and for investments in assets such as joint ventures and intellectual property. These investments are typically made to consolidate our position in the industry, increase our vertical integration or expand into new markets. In the near future, we do not consider acquisitions as a high priority part of our strategy.

Shareholder returns

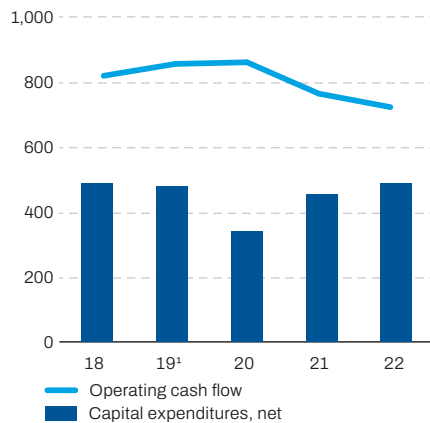
Autoliv has historically used both dividend payments and share repurchases to create shareholder value. Autoliv does not have a set dividend policy. Instead, the Board of Directors regularly analyzes which method is most effective in order to create shareholder value. For the full year 2022, the dividend was increased from \$1.88 to \$2.58 per share. In total, \$224 million was used to pay dividends to shareholders in 2022. Historically, the dividend has usually represented a yield of approximately 2-3% in relation

to Autoliv's average share price, except in 2020, when dividend was only paid for one quarter, as a response to the effects of the COVID-19 pandemic. In 2022, this yield was around 3.2%. Repurchases of shares can create more value for shareholders than dividends, if the share price appreciates over the long-term. This has been the case for Autoliv, as the Company's existing 5.0 million treasury shares have been repurchased at an average cost of \$56.13 per share, while the closing price at the end of 2022 was

\$76.58. In 2022, the Company retired 10 million shares of common stock that had been repurchased under a prior stock repurchase program and since held in treasury. These shares were acquired between 2008 and 2014. During 2022, Autoliv repurchased and retired 1.44 million shares, equal to \$115 million, under the current stock repurchase program authorized by the Board to repurchase up to \$1.5 billion, or 17 million common shares (whichever comes first), between January 2022 and the end of 2024.

Cash flow vs. Capex¹⁾

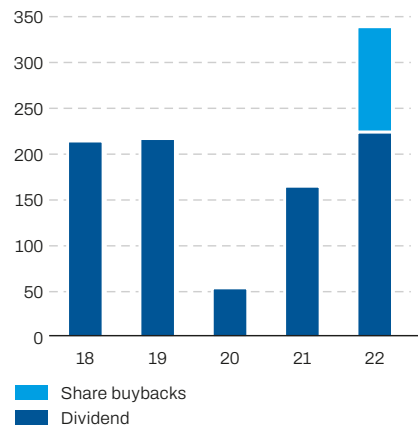
US\$ (Millions)



1) 2018 continuing operations

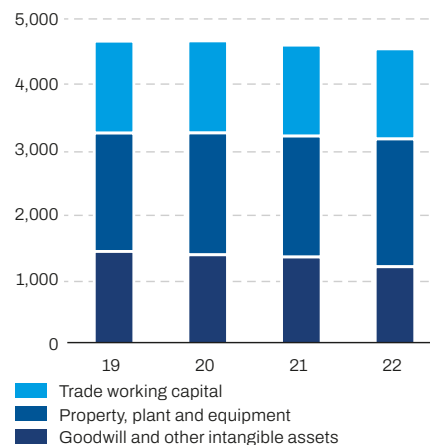
Shareholder returns

US\$ (Millions)



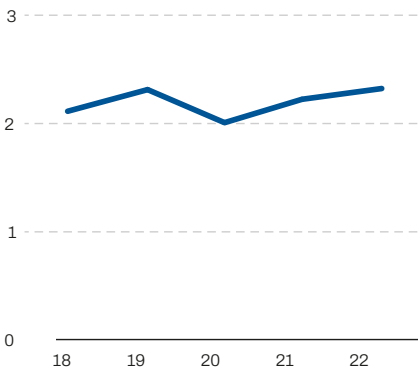
Assets by category

US\$ (Millions)

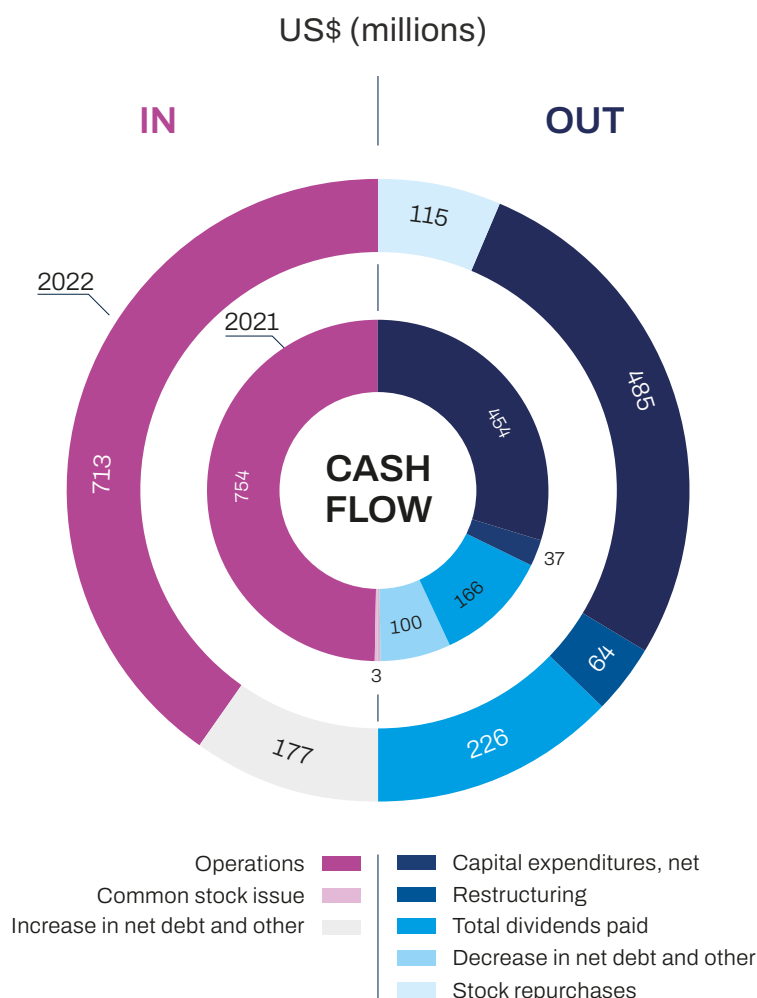


Capital turnover rate

Times, sales in relation to average capital employed



Autoliv's model for creating shareholder value



Capital structure

Our debt limitation policy is to maintain a financial leverage commensurate with a “strong investment grade credit rating”. Our long-term target is to have a leverage ratio (Net Debt, including pension liability, in relation to EBITDA) of around 1 time and to be within the range of 0.5 and 1.5 times. In addition to the above, the objective is to provide the Company with sufficient flexibility to manage the inherent risks and cyclicity in Autoliv's business and allow the Company to realize strategic opportunities and fund growth initiatives while creating shareholder value. In 2022, Autoliv remained inside the target range as cash flow remained solid. On December 31, 2022, the leverage ratio was 1.4 times. Autoliv holds a “BBB with stable outlook” long term credit rating from Standard & Poor's. We aim to maintain a strong investment grade rating as our current capital structure should provide flexibility to generate further shareholder returns and the funding of our capital requirements.

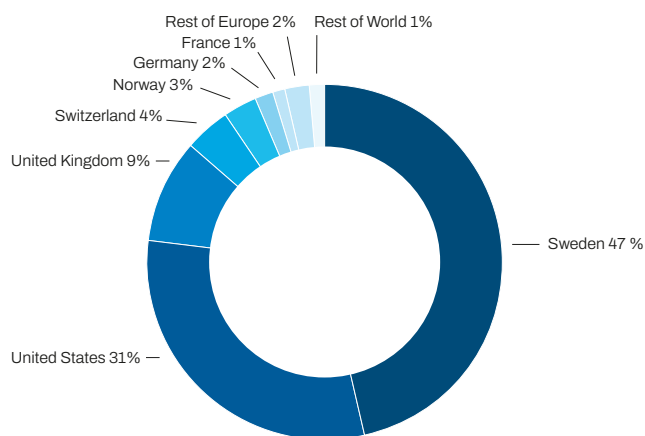
Shareholder information

Autoliv's common stock is traded on the New York Stock

Exchange (NYSE) while Autoliv's Swedish depositary receipts (SDRs) are traded on NASDAQ Stockholm's list for large market cap companies. As of December 31, 2022, Autoliv estimates that approximately 49% were SDRs (vs. 58% a year earlier) while 51% were common stock (vs. 42% a year earlier). In 2022, approximately 76% of total volumes was traded on the NYSE. During 2022, the number of shares outstanding decreased by 1.3 million to 86.2 million (excluding dilution and treasury shares). The number of shares outstanding was 86.2 million. Stock options (if exercised) and granted restricted stock units and performance shares could increase the number of shares outstanding by 0.3 million shares in total. Combined, this would add 0.4% to the Autoliv shares outstanding. As of December 31, 2022, Autoliv estimates that of the outstanding shares, around 90% were held by institutional investors and around 5% by retail investors. Of the shares held by institutional investors, Autoliv estimates that around 47% were held by Sweden-based shareholders, around 31% by US-based shareholders and around 9% by UK-based shareholders. Most of the remaining Autoliv shares were held in Switzerland, Norway, Germany and France.



Ownership distribution institutional investors



Company estimates, end of 2022.

The largest shareholders, Dec 31, 2022

Holder name	
1. Cevian Capital AB	10.8%
2. Alecta Pension Insurance Mutual	7.5%
3. AMF Tjänstepension AB	6.3%



Board of Directors

1. Jan Carlson

Chairman since 2014.
Director since 2007.

2. Mikael Bratt

President and CEO of Autoliv
Inc. Director since 2018.

3. Laurie Brlas

Director since 2020. Member of
the Audit and Risk Committee
and the Nominating and
Corporate Governance
Committee.

4. Hasse Johansson

Director since 2018. Member of
the Audit and Risk Committee.

5. Leif Johansson

Director since 2016. Chair of
the Nominating and Corporate
Governance Committee.
Member of the Leadership
Development and
Compensation Committee.

6. Franz-Josef Kortüm

Director since 2014. Member of
the Nominating and Corporate
Governance Committee.

7. Frédéric Lissalde

Director since 2020. Chair of
the Leadership Development
and Compensation Committee.
Member of the Nominating
and Corporate Governance
Committee.

8. Xiaozhi Liu

Director since 2011. Member of
the Leadership Development and
Compensation Committee.

9. Gustav Lundgren

Director since 2022. Member of
the Audit and Risk Committee.

10. Martin Lundstedt

Director since 2021. Member of
the Leadership Development and
Compensation Committee.

11. Thaddeus "Ted" Senko

Director since 2018. Chair of the
Audit Committee.

For more information, refer to the section on
Corporate Governance and the proxy statement
on www.autoliv.com



Executive Management Team

1. Mikael Bratt
President and CEO.
Employed 2016.

2. Per Ericson
Executive Vice President,
Human Resources &
Sustainability.
Employed 2020.

3. Kevin Fox
President, Autoliv Americas.
Employed 1996.

4. Magnus Jarlegren
Executive Vice President,
Operations.
Employed 2019.

5. Jordi Lombarte
Executive Vice President,
Chief Technology Officer.
Employed 1991.

6. Svante Mogefors¹
Executive Vice President,
Quality. Employed 1996.

7. Colin Naughton
President, Autoliv Asia.
Employed 1995.

8. Anthony Nellis
Executive Vice President,
Legal Affairs General Counsel &
Secretary. Employed 2002.

9. Frithjof Oldorff
President, Autoliv Europe.
Employed 2019.

10. Christian Swahn
Executive Vice President,
Supply Chain Management.
Employed 2019.

11. Fredrik Westin
Executive Vice President,
Chief Financial Officer.
Employed 2020.

12. Sng Yih
President, Autoliv China.
Employed 2022.

For more information, refer to the section on Corporate Governance and the proxy statement on www.autoliv.com

1) Jonas Jademyr has been appointed Executive Vice President, Quality & Program Management effective January 15, 2023, succeeding Svante Mogefors who is retiring.

Contacts and Calendar

AUTOLIV, INC.

Visiting address:

Klarabergsviadukten 70, Section B,
7th Floor, Stockholm, Sweden

Postal address:

P.O. Box 70381, SE-107 24 Stockholm, Sweden

Tel: +46 (0)8 587 20 600

E-mail: info@autoliv.com

www.autoliv.com

CONTACT OUR BOARD

Autoliv, Inc.

P.O. Box 70381, SE-107 24 Stockholm, Sweden

Tel: +46 (0)8 587 20 600

E-mail: legalaffairs@autoliv.com

The Board, individual directors and the committees of the Board can be contacted using the address above. Contact can be made anonymously and communication with individual directors is not screened. The relevant chairman receives all such communication after it has been determined that the content represents a message to such chairman.

STOCK TRANSFER AGENT AND REGISTRAR

www.computershare.com

INVESTOR REQUESTS

Autoliv, Inc.,

P.O. Box 70381, SE-107 24, Stockholm, Sweden

Tel: +46 (0)8 587 20 671

E-mail: ir@autoliv.com

2023 PRELIMINARY FINANCIAL CALENDAR

April 21, Financial Report Q1

May 11, Annual Stockholders Meeting

June 12, Investor Day

July 21, Financial Report Q2

October 20, Financial Report Q3

Concept and Design: PCG

Photos: Lars Trangius, Christian Wyrwa, Dan Kullberg,
Jason Loudermilk Photography, Kun Li, Getty Images,
Shutterstock, Björn Nilsson Graphics, Spectrum digitale
medien GmbH, Jose Lue, Emmy Jonsson



Sustainability Appendix

Pages 32-53 and 61-64 comprise Autoliv's Sustainability Report 2022. Unless otherwise stated, this report covers Autoliv Inc. and all companies over which Autoliv Inc. directly or indirectly exercises control, which as a general rule means that the company owns more than 50% of the voting rights (operational control approach). With respect to environmental data from joint ventures, the equity share approach has been applied.

GHG emissions accounting

The GHG Protocol Corporate Accounting and Reporting Standard has been applied to greenhouse gas (GHG) emissions accounting and reporting. Scope 1 emissions have been calculated using EPA (energy fuels) and IPCC (fugitive emissions) emission factors. Autoliv's primary scope 2 GHG accounting approach is market-based. Market-based emissions are generally based on emissions factors provided by electricity providers. Where such factors are not available, location-based factors has been used. All location-based scope 2 emissions are calculated using IEA emission factors. For more information about scope 3 modelling and emission factors, see p. 42-43.

Changes and restatements

In 2022, there were no material changes in reporting scope. Minor corrections to data, scope or definitions may have resulted in small changes to previously reported numbers.

External reporting guidelines

We consider our Sustainability Report aligned with the EU Non-Financial Reporting Directive. The Appendix includes

references to the SASB Auto Parts Sustainability Accounting Standard. In addition, TR-AP-520a 1 is reported under the "Contingent liabilities" footnote to the financial statements contained in Autoliv's periodic reports (10-Q and 10-K) filed with the SEC. We have used the GRI Standards to inform our reporting, and relevant references to these standards are included in the Appendix. This report is not prepared in accordance with the GRI standard. The Sustainability Report is not subject to external assurance.

Autoliv does not consider its economic activities as taxonomy eligible. We participate actively in the work of the European automotive supplier industry association CLEPA to develop a common position regarding taxonomy eligibility and useful taxonomy alignment guidance.

Communication on Progress

In addition, this Sustainability Report serves as Autoliv's Communication on Progress related to the UN Global Compact. The following sections demonstrate our commitment to implementing the Global Compact principles:

- Road Safety - a Global Challenge: Principle 1
- A Safe and Inclusive Workplace: Principle 6
- Climate Action: Principles 7-9
- Responsible Business: Principles 1-6, 10

Saving More Lives

Targets & Metrics	2022	2021	2020	Comments
100,000 lives saved per year	Close to 35,000			We estimate that in addition to lives saved, more than 450,000 injuries are reduced annually.
Share of global recalls (%) ¹	~2%	~2%	~2%	The share is calculated as a ten year rolling average based on information from national official databases.

1) SASB TR-AP-250a 1.

A Safe and Inclusive Workplace

Targets & Metrics	2022	2021	2020	Comments
Health and Safety¹				
0.35 Incident Rate by 2023	0.32	0.41	0.49	Number of reportable injuries, i.e. injuries that require treatment beyond first aid or results in one or more days of lost time, per 200,000 employee hours of exposure.
3.80 Severity Rate by 2023	3.31	5.84	5.16	Total days away from work due to a work-related reportable injury and/or illness per 200,000 employee hours of exposure.
Work-related fatalities	2	1	0	The fatalities in 2022 were related to an employee involving material handling, and an on-site construction contractor. The incidents were closely investigated, related guidelines were revised and appropriate actions were taken.
Share of production sites ISO 45001 certified (%)	71%	Not available	Not available	Comparable numbers for 2021 and 2020 are not available.

1) GRI 403: Occupational Health and Safety

Inclusion

95% of senior and mid-level management trained in unconscious bias by 2023	52% trained	42% trained	Not applicable	Training started in 2021.
Year-on-year improvement in Employee experience. Continuous - Authenticity - Perceived fairness	80 73	80 73	77 71	Results from the annual employee survey.
22% women in senior management by 2023	18%	17%	22%	Senior management consists of around 110 employees. The significant decrease in 2021 compared to 2020 was caused by senior management being extended to also include some plant managers, a group that is predominantly male.
Share of women in the workforce (%)	49%	47%	47%	
Share of women in the Executive Management Team (%)	0%	8%	8%	

Climate Action

Targets & Metrics	2022	2021	2020	Comments
Carbon neutrality in own operations by 2030	430 kton CO ₂ e	435 kton CO ₂ e	411 kton CO ₂ e	Includes Scope 1+2 market-based emissions.
12% reduction in energy intensity by 2023	5% above baseline	10% above baseline	11% above baseline	Baseline 2018. Internal measurement based on parts delivered.
Year-on-year reduction in waste Continuous	8% increase	3% increase	9% decrease	
GHG Emissions ¹				
GHG emissions intensity	48.6	56.2	57.5	Ton CO ₂ e per million USD sales (FX adjusted).
Direct (scope 1) GHG emissions (kton CO ₂ e)	102	103	98	In 2022, the main source of Scope 1 emissions was natural gas at 51%. 40% of Scope 1 emissions were fugitive emissions.
Indirect (scope 2) GHG emissions (kton CO ₂ e)				In 2022, 95% of Scope 2 market-based emissions came from electricity.
- Market-based	328	331	313	
- Location-based	276	285	268	
Upstream Scope 3 emissions (kton CO ₂ e)				For more information on scope 3 modelling and target scope, see p. 42-43. 2022 emissions are based on 2018 numbers and adjusted for a number of factors such as change in production, estimated recycled content, and logistics volumes and modes. More information is available in our CDP response.
- Purchased goods and services (category 1)	3,000 (2,720 2018)			
- Upstream transportation (category 4)	510 (450 2018)			
- Other upstream (categories 2, 3, 5, 6, 7, 8)	190 (230 2018)			
Total	3,700 (3,400 2018)			

1) GRI 305: Emissions

Energy¹

Energy intensity	111.7	120.6	123.1	MWh per million USD sales (FX adjusted).
Energy use (GWh)				In 2022, around 9% of total energy consumption and 13% of total electricity consumption was renewable.
- Direct	298	290	272	
- Indirect	690	642	608	
Total	988	932	880	

1) SASB TR-AP-130a 1.; GRI 302: Energy

Waste¹

Waste (kton)	100	93	90	
Share of waste by type (%)				
- Non-hazardous	89%	89%	90%	
- Hazardous	11%	11%	10%	
Share of waste by treatment (%)				
- Reuse, recycling, energy recovery	90%	89%	88%	
- Landfill	10%	11%	12%	

1) SASB TR-AP-150a 1.; GRI 306: Energy

Other

Water use (m ³) ¹	2,360,000	2,310,000	2,180,000	
Share of production sites ISO 14001 certified (%)	97%	89%	88%	
Number of significant spills, and related fines	0	0	0	A significant spill is defined as having a financial impact of USD 100,000 or more.

1) GRI 303: Water and Effluents

Responsible Business				
Targets & Metrics	2022	2021	2020	Comments
Business Ethics				
100% in target group completed anti-corruption training Continuous^A	>95%	99%	96%	Target group is based on the risk exposure of certain employee groups. Based on 2021 figures we estimate that over 95% of target group employees have completed anti-corruption training by end of 2022.
100% in target group completed antitrust training Continuous	99%	96%	97%	Target group is based on the risk exposure of certain employee groups.
100% in target group Code of Conduct certified Continuous	99%	99%	99%	Target group is employees in a leadership role.
Supply Chain Sustainability				
100% direct material suppliers sustainability audited Continuous^A	98%	81%	49%	Percentage is based on active direct material suppliers within audit scope who have undergone a sustainability audit.
100% direct material suppliers respond to conflict minerals survey Continuous	89%	99%	100%	
Compliance Speak Up				
Number of Compliance Speak Up reports	318	284	301	Other channels include internal reports directly to management, HR, the Legal or Compliance teams.
– Reported through Autoliv Helpline (%)	89%	88%	85%	
– Reported through other channels (%)	11%	12%	15%	
Compliance Speak Up reports per 100 employees	0.46	0.47	0.44	
Labor Rights				
Share of employees covered by collective bargaining agreements (%) ^C	~50%	~50%	~50%	2020 figure estimated based on 2021 data. Around 80% of the countries where Autoliv has employees have collective bargaining agreements.

A) GRI 205: Anti-corruption

B) GRI 308: Supplier Environmental Assessment; GRI 414: Supplier Social Assessment

C) GRI 2-30: Collective bargaining agreements

**UNITED STATES
SECURITIES AND EXCHANGE COMMISSION**
Washington, D.C. 20549

FORM 10-K

☒ **ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the fiscal year ended December 31, 2022

or

☐ **TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the transition period from _____ to _____

Commission file number: 001-12933

AUTOLIV, INC.

(Exact name of registrant as specified in its charter)

Delaware
(State or other jurisdiction of
incorporation or organization)

51-0378542
(I.R.S. Employer
Identification No.)

**Klarabergsviadukten 70, Section B7,
Box 70381,
Stockholm, Sweden**
(Address of principal executive offices)

SE-107 24
(Zip Code)

+46 8 587 20 600

(Registrant's telephone number, including area code)

Securities registered pursuant to Section 12(b) of the Act:

Title of each class:	Trading Symbol(s):	Name of each exchange on which registered:
Common Stock (par value \$1.00 per share)	ALV	New York Stock Exchange

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. Yes ☒ No ☐

Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Act. Yes ☐ No ☒

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports); and (2) has been subject to such filing requirements for the past 90 days. Yes: ☒ No: ☐

Indicate by check mark whether the registrant has submitted electronically every Interactive Data File required to be submitted pursuant to Rule 405 of Regulation S-T (§ 232.405 of this chapter) during the preceding 12 months (or for such shorter period that the registrant was required to submit such files). Yes: ☒ No: ☐

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, smaller reporting company or an emerging growth company. See the definitions of "large accelerated filer," "accelerated filer," "smaller reporting company" and "emerging growth company" in Rule 12b-2 of the Exchange Act.

Large accelerated filer	<input checked="" type="checkbox"/>	Accelerated filer	<input type="checkbox"/>
Non-accelerated filer	<input type="checkbox"/>	Smaller reporting company	<input type="checkbox"/>
Emerging growth company	<input type="checkbox"/>		

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards pursuant to Section 13(a) of the Exchange Act. ☐

Indicate by check mark whether the registrant has filed a report on and attestation to its management's assessment of the effectiveness of its internal control over financial reporting under Section 404(b) of the Sarbanes-Oxley Act (15 U.S.C. 7262 (b)) by the registered public accounting firm that prepared or issued its audit report. ☒

If securities are registered pursuant to Section 12(b) of the Act, indicate by check mark whether the financial statements of the registrant included in the filing reflect the correction of an error to previously issued financial statements. ☐

Indicate by check mark whether any of those error corrections are restatements that required a recovery analysis of incentive-based compensation received by any of the registrant's executive officers during the relevant recovery period pursuant to §240.10D-1(b). ☐

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Act). Yes: ☐ No: ☒

The aggregate market value of the voting and non-voting common equity of Autoliv, Inc. held by non-affiliates as of the last business day of the second fiscal quarter of 2022 amounted to \$6,233 million.

Number of shares of Common Stock outstanding as of February 8, 2023: 86,189,790.

Auditor Firm Id: 1433

Auditor Name: Ernst & Young AB

Auditor Location: Stockholm, Sweden

DOCUMENTS INCORPORATED BY REFERENCE

Portions of the registrant's definitive Proxy Statement for the annual stockholders' meeting to be held on May 11, 2023, to be dated on or around March 23, 2023 (the "2023 Proxy Statement"), are incorporated by reference into Part III of this Annual Report on Form 10-K. The 2023 Proxy Statement will be filed with the U.S. Securities and Exchange Commission within 120 days after December 31, 2022.

AUTOLIV, INC.

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NOTE ABOUT FORWARD-LOOKING STATEMENTS

This Annual Report on Form 10-K contains statements that are not historical facts but rather forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995. Such forward-looking statements include those that address activities, events or developments that Autoliv, Inc. ("Autoliv," the "Company" or "we") or its management believes or anticipates may occur in the future. All forward-looking statements are based upon our current expectations, various assumptions and/or data available from third parties. Our expectations and assumptions are expressed in good faith and we believe there is a reasonable basis for them. However, there can be no assurance that such forward-looking statements will materialize or prove to be correct as forward-looking statements are inherently subject to known and unknown risks, uncertainties and other factors which may cause actual future results, performance or achievements to differ materially from the future results, performance or achievements expressed in or implied by such forward-looking statements.

In some cases, you can identify these statements by forward-looking words such as "estimates," "expects," "anticipates," "projects," "plans," "intends," "believes," "may," "likely," "might," "would," "should," "could," or the negative of these terms and other comparable terminology, although not all forward-looking statements contain such words.

Because these forward-looking statements involve risks and uncertainties, the outcome could differ materially from those set out in the forward-looking statements for a variety of reasons, including without limitation: general economic conditions, including inflation; the impacts of the coronavirus (COVID-19) pandemic on the Company's financial condition, business operations, operating costs, liquidity, competition and the global economy; disruptions and impacts relating to the ongoing conflict between Russia and Ukraine; changes in and the stability of light vehicle production; fluctuation in vehicle production schedules for which the Company is a supplier; global supply chain disruptions including port, transportation and distribution delays or interruptions; supply chain disruptions and component shortages specific to the automotive industry or the Company; changes in general industry and market conditions or regional growth or decline; changes in and the successful execution of our capacity alignment: restructuring, cost reduction, efficiency, and strategic initiatives and the market reaction thereto; loss of business from increased competition; higher raw material, fuel, energy, and other costs; changes in consumer and customer preferences for end products; customer losses; changes in regulatory conditions; customer bankruptcies, consolidations or restructuring or divestiture of customer brands; unfavorable fluctuations in currencies or interest rates among the various jurisdictions in which we operate; market acceptance of our new products; costs or difficulties related to the integration of any new or acquired businesses and technologies; continued uncertainty in pricing and other negotiations with customers; successful integration of acquisitions and operations of joint ventures; successful implementation of strategic partnerships and collaborations; our ability to be awarded new business; product liability, warranty and recall claims and investigations and other litigation, civil judgments or financial penalties and customer reactions thereto; higher expenses for our pension and other postretirement benefits, including higher funding needs for our pension plans; work stoppages or other labor issues; possible adverse results of pending or future litigation or infringement claims, and the availability of insurance with respect to such matters; our ability to protect our intellectual property rights; negative impacts of antitrust investigations or other governmental investigations and associated litigation relating to the conduct of our business; tax assessments by governmental authorities and changes in our effective tax rate; dependence on key personnel; legislative or regulatory changes impacting or limiting our business; our ability to meet our sustainability targets, goals and commitments; political conditions; dependence on and relationships with customers and suppliers; the conditions necessary to hit our medium term financial targets; and other risks and uncertainties identified in Item 1A - "Risk Factors" and Item 7 - "Management's Discussion and Analysis of Financial Condition and Results of Operations" in this Annual Report.

For any forward-looking statements contained in this or any other document, we claim the protection of the safe harbor for forward-looking statements contained in the Private Securities Litigation Reform Act of 1995, and we assume no obligation to update publicly or revise any forward-looking statements in light of new information or future events, except as required by law.

PART I

Item 1. Business

General

Autoliv, Inc. ("Autoliv", the "Company" or "we") is a Delaware corporation with its principal executive offices in Stockholm, Sweden. The Company functions as a holding corporation and owns two principal subsidiaries, Autoliv AB and Autoliv ASP, Inc. The Company's fiscal year ends on December 31.

The Company is a leading developer, manufacturer, and supplier of passive safety systems to the automotive industry with a broad range of product offerings.

Passive safety systems are primarily meant to improve safety for occupants in a vehicle. Passive safety systems include modules and components for frontal-impact airbag protection systems, side-impact airbag protection systems, seatbelts, steering wheels, inflator technologies, and battery cut-off switches.

To expand its product offerings, the Company has formed Mobility Safety Solutions. By combining its core competence and industry experience, the Company also develops and manufactures mobility safety solutions such as pedestrian protection, battery cut-off switches, connected safety services, and safety solutions for riders of powered two wheelers.

The Company has approximately 62 production facilities in 27 countries and its customers include the world's largest car manufacturers. The Company's sales in 2022 were \$8.8 billion, approximately 66% of which consisted of airbag and steering wheel products and approximately 34% of which consisted of seatbelt products. The Company's business is conducted in the following geographical regions: Europe, the Americas, China, Japan and the Rest of Asia (ROA).

The Company's head office is located in Stockholm, Sweden, where it currently employs approximately 98 people. At December 31, 2022, the Company had a total number of personnel of approximately 69,100 worldwide, whereof 11% were temporary personnel.

Additional information required by this Item 1 regarding developments in the Company's business during 2022 is contained under Item 7 in this Annual Report.

Reportable Segment

The Company has one reportable segment based on the way the Company evaluates its financial performance and manages its operations. The Company's business is comprised of passive safety products - principally airbags (including steering wheels and inflators) and seatbelts. For more information regarding the Company's segment reporting, see Note 1, Basis of Presentation, to the Consolidated Financial Statements in this Annual Report.

Products, Market, and Competition

Products

Providing life-saving solutions is a key priority as the world population grows and develops. However, population expansion in growth markets and the rise of megacities creates new complexities. To meet this challenge, the Company develops safety solutions for both mobility and society that work in real life situations.

The Company's safety systems such as seatbelts and airbags substantially mitigate human consequences of traffic accidents.

The airbag module is designed to inflate extremely rapidly then quickly deflate during a collision or impact. It consists of the container, an airbag cushion, and an inflator. The purpose of the airbag is to provide the occupants a cushioning and restraint during a crash event to prevent any impact or impact-caused injuries between the occupant and the interior of the vehicle.

Seatbelts can reduce the overall risk of serious injuries in frontal crashes by as much as 60% due to advanced seatbelt technologies such as pretensioners and load limiters.

The Company also manufactures steering wheels that are crafted to ensure they meet safety requirements and are functional as well as stylish.

Market and Competition

Consumer research clearly shows that consumers want safe vehicles, and several significant trends are likely to have a positive influence on overall safety content per vehicle. These include:

- 1) Society becoming increasingly focused on Vision Zero, which includes a goal of reducing traffic fatalities and their associated costs;
- 2) Demographic trends of increased urbanization, aging driver populations, and increased safety focus in growth markets;
- 3) Evolving government regulations and test rating systems to improve the safety of vehicles in various markets, such as the updated Euro New Car Assessment Program (NCAP), China NCAP, and USNCAP; and
- 4) The trend towards more electrical vehicles will potentially drive additional solutions to reduce noise and to cut the electrical power in case of an accident.

The automotive safety market is driven by two primary factors: light vehicle production (LVP) and content per vehicle (CPV).

The first growth driver, LVP, has increased at an average annual growth rate of around 1.6% since the start of Autoliv in 1997 despite the substantial headwinds from supply chain disruptions and semiconductor shortages. According to S&P Global, LVP is forecasted to grow to close to 87 million by 2025 from approximately 79 million in 2021, as the market is expected to recover from the effects of the COVID-19 pandemic and component shortages.

Unlike LVP, where Autoliv can only aim to be on the best-selling platforms, Autoliv can influence CPV more directly by continuously developing and introducing new technologies with higher value-added features. Over the long term, this increases average safety CPV and has caused the markets where the Company does business to grow faster than the LVP.

Since 1997, the Company's sales compound annual growth rate (CAGR) for passive safety has been around 5% compared to the market rate of around 2.4% which includes an LVP growth of around 1.6%. The Company's outperformance is a result of a steady flow of new passive safety technologies, strong focus on quality and a superior global footprint both in products and engineering. This has enabled Autoliv to increase its global market share in passive safety from 27% in 1997 to 43% in 2022.

In the Developed Markets (Western Europe, North America, Japan, and South Korea) the CPV is around \$320. CPV growth in these regions mainly come from new safety systems such as active seatbelts, knee airbags, and front-center airbags along with improved protection for pedestrians and rear-seat occupants like bag-in-belt or more advanced seatbelts.

In the Growth Markets (all markets other than the Developed Markets), the Company sees great opportunities for CPV growth from more airbags and advanced seatbelt products. Average CPV in the Growth Markets is around \$200, approximately \$120 less than in the Developed Markets.

As a result of higher installation rates of airbags, more advanced seatbelt products, and more complex steering wheels, CPV is expected to increase at a similar pace in both Developed and Growth Markets over the next three years. LVP in the Developed Markets is expected to increase faster than in the Growth Markets during the same period. This is because the Developed Markets are expected to recover from the negative effects of supply chain disruptions and semiconductor shortages experienced in 2022. Supported by a positive LVP mix effect from higher growth in higher CPV markets, the annual passive safety market (seatbelts and airbags, including steering wheels), is expected to grow from around \$20 billion in 2022 to more than \$25 billion over the next three years, based on the current macro-economic outlook and the Company's internal market intelligence and estimates. The highest growth rate is expected in steering wheels, where Autoliv has a global market share of around 37%, generated by the trend toward higher-value steering wheels with leather and additional features.

In seatbelts, Autoliv has reached a global market share of around 45%, primarily due to being the technology leader with several important innovations such as pretensioners and active seatbelts. The Company's strong market position is also a reflection of its superior global footprint. Seatbelts are the primary life-saving safety product globally and are also an important requirement in low-end vehicles in the Growth Markets. This provides the Company with an excellent opportunity to benefit from the expected growth in this segment of the market.

The market for airbags, where Autoliv has a global market share of around 44%, is expected to grow mainly as result of higher installation rates of inflatable curtains, side airbags, and knee airbags. Additionally, the new front center airbag is expected to start to contribute to the market growth.

The Company's ability to consistently outperform market growth is rooted in a steady flow of new safety technologies, a strong focus on quality, and a superior production and engineering footprint.

The Company's competitors

Autoliv is the clear market leader in passive safety components and systems for the automotive industry with an estimated global market share of 43%.

ZF, one of the Company's largest competitors, is a global leader in driveline and chassis technology as well as in passive safety technologies, and is one of the largest global automotive suppliers.

Another of the Company's largest competitors is Joyson Safety Systems (JSS). JSS is a Chinese owned company and is the result of the merger between Key Safety Systems (KSS) and Takata Corporation after KSS acquired Takata in 2018.

In Japan, Brazil, South Korea, and China, there are a number of local suppliers that have close ties with the domestic vehicle manufacturers. For example, Toyota uses "keiretsu" (in-house) suppliers Tokai Rika for seatbelts and Toyoda Gosei for airbags and steering wheels. These suppliers generally receive most of the Toyota business in Japan, in the same way, Mobis, a major supplier to Hyundai/Kia in South Korea, generally receives a significant part of their business.

Other competitors include Nihon Plast and Ashimori of Japan, Yanfeng and Jinheng of China, Samsung in South Korea, and Chris Cintos de Seguranca in South America. Collectively, these competitors account for the majority of the remaining market share in passive safety.

Additional information concerning the Company's products, markets and competition is included in the "Risks and Risk Management" section under Item 7 of this Annual Report.

Manufacturing and Production

See “Item 2. Properties” for a description of Autoliv’s principal properties. The component factories manufacture inflators, propellant, initiators, textile cushions, webbing, pressed steel parts, springs, and overmolded steel parts used in seatbelt and airbag assembly and steering wheels. The assembly factories source components from a number of parties, including Autoliv’s own component factories, and assemble complete restraint systems for “just-in-time” delivery to customers. The products manufactured by Autoliv’s consolidated subsidiaries in 2022 consisted of 134 million complete seatbelt systems (of which 87 million were fitted with pretensioners), 102 million side airbags (including curtain airbags and front center airbags), 56 million frontal airbags, 13 million other airbags and 19 million steering wheels.

Autoliv’s “just-in-time” delivery system is designed to accommodate the specific requirements of each customer for low levels of inventory and rapid stock delivery service. “Just-in-time” deliveries require final assembly or, at least, distribution centers in geographic areas close to customers to facilitate rapid delivery. The fact that the major automobile manufacturers are continually expanding their production activities into more countries and require the same or similar safety systems as those produced in Europe, Japan, or the U.S. increases the importance for suppliers to have assembly capacity in several countries. Consolidation among the Company’s customers also supports this trend.

Autoliv’s assembly operations generally are not constrained by capacity considerations unless there is a disruption in the supply of raw materials and components. When dramatic shifts in LVP occur, Autoliv can generally adjust capacity in response to any changes in demand within a few days by adding or removing work shifts and within a few months by adding or removing standardized production and assembly lines. Most of Autoliv’s assembly factories can make sufficient space available to accommodate additional production lines to satisfy foreseeable increases in capacity. As a result, Autoliv can usually adjust its manufacturing capacity faster than its customers can adjust their capacity as a result of fluctuations in the general demand for vehicles or in the demand for a specific vehicle model, provided that customers promptly notify Autoliv when they become aware of such changes in demand.

When dramatic shifts in LVP occur, as we seen in 2022 due to component shortages, or when there is a shift in regional LVP, the capacity adjustments can take more time and be more costly. Additionally, when there is significant demand for a given product due to a major recall of a competitor’s product, like certain of the Company’s customers have experienced, capacity adjustments may take time.

The Company could experience disruption in its supply or delivery chain, which could cause one or more of its customers to halt or delay production. For more information, see Item 1A – “Risk Factors” in this Annual Report.

Quality Management

Autoliv believes that superior quality is a prerequisite to being considered a leading global supplier of automotive safety systems and is key to the Company’s financial performance, because quality excellence is critical for winning new orders, preventing recalls, and maintaining low scrap rates. Autoliv has for many years emphasized a “zero-defect” proactive quality policy and continues to strive to improve its working methods. This means that Autoliv’s products are expected to always meet performance expectations and be delivered to its customers at the right times and in the right amounts. Furthermore, the Company believes its continued quality improvements further enhance the Company’s reputation among its customers, employees, and governmental authorities.

Although quality has always been paramount in the automotive industry, especially for safety products, automobile manufacturers have become increasingly focused on quality with even less tolerance for any deviations. This intensified focus on quality is partially due to an increase in the number of vehicle recalls for a variety of reasons (not just safety), including a few high-profile vehicle recalls. This trend is likely to continue as automobile manufacturers introduce even stricter quality requirements and regulating agencies and other authorities increase the level of scrutiny given to vehicle safety issues. The Company has not been immune to the recalls that have been impacting the automotive industry.

The Company continues to drive its quality initiative called “Q5,” which was initiated in the summer of 2010. It is an integral part of the Company’s strategy of shaping a proactive quality culture of zero defects. It is called “Q5” because it addresses quality in five dimensions: products, customers, growth, behavior, and suppliers. The goal of Q5 is to firmly tie together quality with value within all of the Company’s processes and for all of its employees, thereby leading to the best value for its customers. Since 2010, the Company has continually expanded this quality initiative to provide additional skills training to more employees and suppliers. These activities have significantly improved the Company’s quality performance.

In the Company’s pursuit of excellence in quality, the Company has developed a chain of four “defense lines” against potential quality issues. These defense lines consist of: 1) robust product designs, 2) flawless components from suppliers and the Company’s own in-house component companies, 3) manufacturing flawless products with a system for verifying that the Company’s products conform with specifications, and 4) an advanced traceability system in the event of a recall.

The Company’s pursuit of quality excellence extends from the earliest phases of product development to the proper disposal of a product following many years of use in a vehicle. Autoliv’s comprehensive Autoliv Product Development System (“APS”) includes several key check points during the process of developing new products that are designed to ensure that such products are well-built and have no hidden defects. Through this process, the Company works closely with its suppliers and customers to set clear standards that help to ensure robust component design and lowest cost for function in order to proactively prevent problems and ensure the Company delivers only the best designs to the market.

The APS, based on the goals of improving quality and efficiency, is at the core of Autoliv's manufacturing philosophy. APS integrates essential quality elements, such as mistake proofing, statistical process control and operator involvement, into the manufacturing processes so all Autoliv associates are aware of and understand the critical connection between themselves and the Company's lifesaving products. This "zero-defect" principle extends beyond Autoliv to the entire supplier base. All of the Company's suppliers must accept the strict quality standards in the global Autoliv Supplier Manual, which defines the Company's quality requirements and focuses on preventing bad parts from being produced by its suppliers and helps eliminate defective intermediate products in the Company's assembly lines as early as possible. In addition, Autoliv's One Product One Process ("1P1P") initiative is its strategy for developing and managing standardization of both core products and customer-specific features, leading not only to improved quality, but also greater cost efficiency and more efficient supply chain management.

IATF 16949:2016 is one of the automotive industry's most widely used international standards for quality management. All of the Company's facilities that ship products to OEMs are regularly certified according to the International Automotive Task Force (IATF) standards.

Environmental and Safety Regulations

For information on how environmental and safety regulations impact the Company's business, see "Risk Factors – 'Our business may be adversely affected by laws or regulations, including environmental, occupational health and safety, and other governmental regulations', 'Global climate change could negatively affect our business', 'Our goals, targets, and ambitions related to sustainability and emissions reduction, and our public statements and disclosures regarding them, expose us to numerous risks' and 'Our business may be adversely affected by changes in automotive safety regulations or concerns that drive further regulation of the automobile safety market'" in Item 1A and "Risks and Risk Management" in Item 7 of this Annual Report.

Climate change

The Company is committed to operating its business in an environmentally sustainable manner, meaning developing and producing products in a resource efficient way while limiting the Company's environmental impact in the most material areas of greenhouse gas emissions, energy use, waste, and water. With particular emphasis on climate action, the Company actively engages with its customers, suppliers, and others to drive sustainable mobility.

In June 2021, the Company launched an updated climate strategy including new long-term climate ambitions:

- Carbon neutrality in own operations by 2030
- Net-zero emissions across our supply chain by 2040

These industry-leading climate ambitions are aligned with a 1.5°C trajectory and represent a serious step-up in ambition level from earlier short-term climate targets. They should position the Company as the supplier of choice for the most progressive climate-focused customers, helping to ensure the Company's competitiveness now and in the future. In addition to these ambitions, the Company adopted Science Based Targets (SBT) for 2030 covering its own operations as well as the supply chain. The targets were approved in January 2022 and are available at the SBTi website.

For more information about how climate change impacts the Company's business, see "Operational Risks - Climate impact" in Item 7 and "Risk factors – Global climate change could negatively affect our business" in Item 1A of this Annual Report.

Raw Materials

Direct material purchased from external suppliers represents approximately 52% of the Company's net sales in 2022. The Company mainly purchases manufactured components and raw materials for its operations. The Company takes several actions to manage the raw material fluctuations, such as competitive sourcing and looking for alternative materials.

For information on the sources and availability of raw materials, see "Operational Risks - Component costs" in Item 7 and "Risk Factors – Changes in the source, cost, availability of, and regulations pertaining to raw materials and components may adversely affect our profit margins" in Item 1A of this Annual Report.

Intellectual Property

The Company has developed a considerable amount of proprietary technology related to automotive safety systems and relies on many patents to protect such technology. The Company's intellectual property plays an important role in maintaining its competitive position in a number of the markets the Company serves. For information on the Company's use of intellectual property and its importance to the Company, see "Risk Factors – If our patents are declared invalid or our technology infringes on the proprietary rights of others, our ability to compete may be impaired" in Item 1A of this Annual Report.

Backlog

The Company has frame contracts with automobile manufacturers and such contracts are typically entered into up to three years before the start of production of the relevant car model or platform and provide for a term covering the life of such car model or platform including service parts after a vehicle model is no longer produced. These contracts, however, do not typically provide minimum quantities, firm prices, or exclusivity but instead permit the automobile manufacturer to resource the relevant products at given intervals (or at any time) from other suppliers.

Dependence on Customers

In 2022, the Company's top five customers represented around 49% of its consolidated sales and the Company's top ten customers represented around 80% of its consolidated sales. This reflects the concentration of manufacturers in the automotive industry. The five largest OEMs in 2022 accounted for around 48% of global LVP, and the ten largest OEMs accounted for around 70% of global LVP. A delivery contract is typically for the lifetime of a vehicle model, which is normally between five and seven years depending on customer platform sourcing preferences and strategies.

For information on the Company's dependence on customers, see "Risk Factors – Our business could be materially and adversely affected if we lost any of our largest customers or if they were unable to pay their invoices" in Item 1A of this Annual Report, and "Dependence on Customers" under the section "Strategic Risks" in Item 7 of this Annual Report, and Note 20 to the Consolidated Financial Statements.

Customer sales trends

Asian vehicle producers have steadily become increasingly important, mainly driven by growth with Japanese OEMs. As a group they represent around 43% of global sales in 2022, of which Japanese OEMs accounts for approximately two thirds. This is a result of the Company's stronger market position based on its local presence in Japan. The local Chinese OEMs as a group accounted for around 5% of the Company's global sales in 2022, with Great Wall representing more than 1% of the Company's global sales.

European based brands accounted for 30% of the Company's global sales in 2022. The U.S. based OEMs (including Chrysler and new EV manufactures) accounted for 25% of the Company's global sales in 2022. Globally one of the Company's strongest growing customers from 2021 to 2022 was Stellantis.

Research, Development and Engineering, net (R,D&E)

No single customer project accounted for more than 5% of Autoliv's total R,D&E, net spending during 2022. To fuel Autoliv's product portfolio, additional expertise is brought in-house via technology partnerships and licensing agreements.

During 2022, gross expenditures for R,D&E amounted to \$595 million compared to \$596 million in 2021. Of these amounts, \$205 million in 2022 and \$205 million in 2021 were related to customer-funded engineering projects and crash tests reimbursed by the customers. Net of this income, R,D&E expenditures in 2022 was \$390 million, virtually unchanged compared to 2021. Of the R,D&E, net expense in 2022, 79% was for projects and programs where the Company has customer orders, typically related to vehicle models in development. The remaining 21% was mainly for new innovations, products and standardizations that will yield greater benefits over time.

Regulatory Costs

The fitting of seatbelts in most types of motor vehicles is mandatory in almost all countries and many countries have strict laws regarding the use of seatbelts while in vehicles. In addition, most developed countries require that seats in intercity buses and commercial vehicles be fitted with seatbelts. In the U.S., federal legislation requires frontal airbags on the driver-side and the passenger-side of all new passenger cars since 1998 and in all sport utility vehicles, pickup trucks, and vans since 1999.

For information concerning the material effects on the Company's business relating to its compliance with government safety regulations, see "Risk Factors – 'Our business may be adversely affected by laws or regulations, including environmental, occupational health and safety, and other governmental regulations' and 'Our business may be adversely affected by changes in automotive safety regulations or concerns that drive further regulation of the automobile safety market'" in Item 1A of this Annual Report and in Item 7 under the section "Risks and Risk Management" of this Annual Report.

Human Capital Management

The Company's drive for excellence is what makes Autoliv the world's leading supplier of automotive safety systems. From the earliest stages of product development to sales and design to the final delivery of the finished product, Autoliv's employees are driven by the Company's mission to save more lives.

The successful execution of the Company's strategies relies on its ability to shape a quality and performance-oriented culture, and to adapt quickly to sudden shifts in its circumstances, such as the COVID-19 pandemic, supply chain disruptions, and geopolitical instability experienced in 2022. A turbulent external environment presents many challenges but also opportunities. As the Company moves forward its workforce strives to respond with agility to new possibilities to grow and improve the Company's business whilst delivering with excellence to its customers. The Company builds a winning team by focusing on creating a work environment that attracts, retains, and engages its employees. The Company's employees take great pride in working together to provide safety solutions for mobility and society that work in real life situations, and the Company is always looking for new team members who share this passion.

The table below shows the Company's total workforce as of December 31, 2022 and 2021.

	2022	2021
Total workforce	69,100	60,600
Whereof:		
Direct workforce in manufacturing	50,600	43,000
Indirect workforce	18,500	17,600
Temporary workforce	11%	8%

Diversity and Inclusion

When attracting, developing and retaining talent, the Company seeks individuals who hold varied experiences and viewpoints to create an inclusive and diverse workplace that allows each employee to do their best work and drive the Company's collective success. The Company's workforce reflects the diversity of the countries and cultures in which it operates. At the end of 2022, 49% of the Company's workforce and 18% of the Company's senior management positions were held by women.

The Company has operations in 27 different countries, with 17% of its workforce located in Asia (excluding China), 31% in the Americas, 13% in China, and 39% in Europe (including South Africa, Tunisia, Russia, and Turkey).

The table below show the Company's workforce by age group and gender in % at the end of 2022.

% of Men	Age group	% of Women
1%	>60	1%
5%	51-60	5%
10%	41-50	11%
18%	31-40	16%
15%	21-30	14%
2%	<20	2%

Talent Attraction, Development, and Retention

The Company believes that attraction, development, and retention of talent is essential to its success, especially in today's environment. The Company offers an inclusive work environment where its employees are challenged and achieve great things together. Supporting the development of the employees is essential in a highly competitive and rapidly changing environment. An important cornerstone of each employee's growth is the ongoing dialogue between the team member and manager, which is summarized during an annual Performance and Development Dialogue (PDD). During the year, 99% of targeted employees conducted a PDD with their managers. To provide opportunities for professional and personal growth of the employees, the Company has a multitude of development channels, including technical and specialist career paths, international assignments and other such programs.

The Company provides market-based competitive compensation through its salary, annual incentive, and long-term incentive programs and benefits packages that promote employee well-being across all aspects of their lives.

Health and Safety

The Company is committed to providing a zero accident work environment that promotes the health, safety and welfare of its employees. Autoliv's production facilities implement the Company's health and safety management system, which is supported by leadership teams. Implementation of the system as well as the ISO 45001 health and safety management system is monitored through internal and external audits. At the end of 2022, 71% of production facilities were certified according to ISO 45001.

Throughout the COVID-19 pandemic, the Company has protected its employees' health and well-being by providing the technology and communication equipment necessary to allow many of its employees to work remotely. For those who cannot effectively do their jobs remotely, the Company has put protocols in place to ensure a safe working environment.

Labor Relations

The Company offers fair terms and conditions of employment. The Company's overall purpose, Code of Conduct, talent development strategies and employment policies support the principles in the United Nations Universal Declaration of Human Rights, and the International Labor Organization's Fundamental Principles and Labor Standards.

The Company considers its relationship with its personnel to be good. While there have been a small number of minor labor disputes historically, such disputes have not had a significant or lasting impact on the Company's relationship with its employees, customer perception of its employee practices or its business results.

Major unions to which some of the Company's employees belong in Europe include: IG Metall in Germany; Unite the union in the United Kingdom; Confédération Générale des Travailleurs (CGT), Confédération Française Démocratique du Travail (CFDT), Confédération Française de l'Encadrement Confédération Générale des cadres (CFE-CGC), Force Ouvrière (FO), Confédération Française des Travailleurs Chrétiens (CFTC), Solidaires, Unitaires, Démocratiques (SUD) and Confédération Autonome du Travail (CAT) in France; Union General de Trabajadores (UGT), Union Sindical Obrera (USO), Comisiones Obreras (CCOO) and Confederacion General de Trabajadores (CGT) in Spain; IF Metall, Unionen, Sveriges Ingenjörer and Ledarna in Sweden; Industrialaal- ja Metallitöötajate Ametiühingute Liit (IMTAL) in Estonia; Vasas Szakszervezeti Szövetség (Hungarian Metallworkers' Federation) in Hungary; Samorządny Niezależny Związek Zawodowy Pracowników and Zakładowa Organizacja Związkowa NSZZ Solidarnosc in Poland; National Union of Metal Workers South Africa (NUMSA) in South Africa; Union Générale des Travailleurs Tunisiens (UGTT) and Union des travailleurs Tunisiens (UTT) in Tunisia and Türk Metal Sendikası in Turkey.

In addition, the Company's employees in other regions are represented by the following unions: Unifor in Canada; Sindicato de Jornaleros y Obreros Industriales y de la Industria Maquiladora de H.Matamoros, Tamaulipas (CTM); Sindicato Nacional de Trabajadores de la Industria Metalúrgica y Similares (CTM); Sindicato Nacional de Trabajadores de la Industria Arnesera, Eléctrica, Automotriz y Aeronáutica de la República Mexicana; "Nueva Cultura Laboral" "de trabajadores de la fabricación, manufactura, ensamble de autopartes mecánicas y eléctricas y componentes de la industria Automotriz (CROC); Sindicato Nacional de Trabajadores de la Industria de Autopartes en General y/o Similares, Conexos y sus Servicios de la República Mexicana, in Mexico; Sindicato dos Metalúrgicos de Taubaté e Região in Brazil; Autoliv India Employees Association, Bangalore & Mysore in India; the Korean Metal Workers Union (FKTU) in Korea and Autoliv Japan Roudou Kumiai in Japan; Shanghai General Labor Union in China.

In many European countries, Canada, Mexico, Brazil and Korea, wages, salaries and general working conditions are negotiated with local unions and/or are subject to centrally negotiated collective bargaining agreements. The terms of the Company's various agreements with unions typically range between 1-3 years. Some of the Company's subsidiaries in Europe, Canada, Mexico, Brazil and Korea must negotiate with the applicable local unions with respect to important changes in operations, working and employment conditions. Twice a year, members of the Company's management conduct a meeting with the European Works Council (EWC) to provide employee representatives with important information about the Company and a forum for the exchange of ideas and opinions.

In many Asia Pacific countries, the central or regional governments provide guidance each year for salary adjustments or statutory minimum wage for workers. The Company's employees may join associations in accordance with local legislation and rules, although the level of unionization varies significantly throughout its operations.

Key Performance Indicators (KPIs)

The table below reflects certain KPIs on which the Company is particularly focused on with respect to the management of its workforce.

KPI	2022	2021
% of Autoliv facilities certified (OHSAS 18001 or ISO 45001)	71%	Not available
Incident rate ¹⁾	0.32	0.41
Severity rate ²⁾	3.31	5.84
% women in workforce	49%	47%
% women in senior management positions	18%	17%
% PDD rate ³⁾	99%	99%
No. of employees attended at least one training program	4,100	4,400

¹⁾ Number of reportable injuries per 200,000 employee hours of exposure.

²⁾ Total days away from work due to a work-related reportable injury and/or illness per 200,000 employee hours of exposure.

³⁾ Percentage of total employees participating in Autoliv's annual Performance and Development Dialogue (PDD).

Available Information

The Company files or furnishes with the United States Securities and Exchange Commission (the "SEC") periodic reports and amendments thereto, which include annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K, proxy statements and other information. Such reports, amendments, proxy statements, and other information are made available free of charge on the Company's corporate website at www.autoliv.com and are available as soon as reasonably practicable after they are electronically filed with the SEC. The Company's Corporate Governance Guidelines, committee charters, code of conduct, and other documents governing the Company are also available on its corporate website at www.autoliv.com. The SEC maintains an internet site that contains reports, proxy statements and other information at www.sec.gov. Hard copies of the above-mentioned documents can be obtained free of charge by contacting the Company at: Autoliv, Inc., P.O. Box 70381, SE-107 24, Stockholm, Sweden.

Item 1A. Risk Factors

Our business, financial condition, operating results and cash flows may be impacted by a number of factors. A discussion of the risks associated with these material risk factors is included below.

RISKS RELATED TO ADVERSE GLOBAL HEALTH AND GEOPOLITICAL DEVELOPMENTS

We face risks related to the novel coronavirus (COVID-19) pandemic that have, and are expected to continue to have, an adverse impact on our business and financial performance

The COVID-19 pandemic has created significant volatility in the global economy and led to reduced economic activity and employment and has disrupted, and may continue to disrupt, the global automotive industry and customer sales, production volumes and purchases of light vehicles by end-consumers. The spread of COVID-19 has also caused disruptions in the manufacturing, delivery, and overall supply chains of automobile manufacturers and suppliers. Global light vehicle production ("LVP") has been lower than expected and is expected to continue to be volatile. If the global economic effects caused by the pandemic continue or increase, overall customer demand may decrease, which could have a material and adverse effect on our business, results of operations, and financial condition. The full extent of the effect of the pandemic on us, our customers, our supply chain or the global supply chain and our business will depend on future developments, which are highly uncertain and cannot be predicted with confidence, including the duration and severity of the outbreak, subsequent outbreaks or the extent of any recession resulting from the pandemic. We may continue to experience the effects of the pandemic even after it has waned, and our business, results of operations and financial condition could continue to be affected. In addition to the risks specifically described above, the impacts of the pandemic are likely to implicate and exacerbate other risks disclosed in Item 1A of this Annual Report, any of which could have a material effect on our operating results, cash flows, or financial condition.

Although we have minimal operations in Russia, we face risks related to the war in Ukraine, which has had, and is expected to continue to have, an adverse impact on our business and financial performance

The macro-economic uncertainty has been exacerbated by the war in Ukraine. Although the length and impact of the ongoing war is highly unpredictable, it exacerbated volatility in commodity prices, energy prices, inflationary pressures, credit markets, foreign exchange rates and supply chain disruptions. Furthermore, governments in the United States, United Kingdom, Canada and European Union have each imposed export controls on certain products and financial and economic sanctions on certain industry sectors and parties in Russia. Existing or additional sanctions could further adversely affect the global economy and further disrupt the global supply chain. Inflation is also currently high world-wide and may continue for an unforeseen time.

Due in part to the negative impact of the war in Ukraine, we have experienced exacerbated increases in raw materials and increased costs for transportation, energy, and commodities. Although we have negotiated and continue to negotiate with our customers with respect to these additional costs, commercial negotiations with our customers may not be successful or may not offset all of the adverse impact of higher transportation, energy and commodity costs. Additionally, even if we are successful with respect to negotiations with customers relating to cost increases, there may be delay before we recover any increased costs. These may have a material negative impact on our business and results of operations.

RISKS RELATED TO OUR INDUSTRY

The cyclical nature of automotive sales and production can adversely affect our business. Our business is directly related to LVP in the global market and by our customers, and automotive sales and LVP are the most important drivers for our sales

Automotive sales and production are highly cyclical and can be affected by general or regional economic or industry conditions, the level of consumer demand, recalls and other safety issues, labor relations issues, technological changes, fuel prices and availability, vehicle safety regulations and other regulatory requirements, governmental initiatives, trade agreements, political volatility (especially in energy producing countries and growth markets), changes in interest rate levels and credit availability and other factors. Some regions around the world may at various times be more particularly impacted by these factors than other regions. Economic declines that result in a significant reduction in automotive sales and production by our customers have in the past had, and may in the future have, a material adverse effect on our business, results of operations, and financial condition. Our sales are also affected by inventory levels of our customers. We cannot predict when our customers will decide to either increase or reduce inventory levels or whether new inventory levels will approximate historical inventory levels. This may exacerbate variability in our order intake and, as a result, our revenues and financial condition. Uncertainty regarding inventory levels may be exacerbated by consumer financing programs initiated or terminated by our customers or governments as such changes may affect the timing of their sales. Changes in automotive sales and LVP and/or customers' inventory levels will have an impact on our mid- and long-term financial targets, earnings guidance, and estimates. In addition, we base our growth projections in part on business awards, or order intake, made by our customers. However, actual production orders from our customers may not approximate the awarded business or our estimated order intake. Any significant reduction in automotive sales and/or LVP by our customers, whether due to general economic conditions or any other factors relevant to sales or LVP, could have a material adverse effect on our business, results of operations and financial condition.

Growth rates in safety content per vehicle, which can be impacted by changes in consumer trends and political decisions, could affect our results in the future

The Company estimates that the average global content of passive safety systems per light vehicle increased in 2022 to around \$255. Vehicles produced in different markets may have various passive safety content values. For example, in developed markets such as Western Europe and North America, the premium segment has an average passive safety content values of over \$350 per vehicle, whereas in growth markets such as China and India the average passive safety content per vehicle is approximately \$210 and \$100, respectively. Due to the majority of the growth in global LVP over time being concentrated in growth markets, our operating results may be impacted if the passive safety content per vehicle remains low and if the penetration of more advanced automotive safety systems does not increase in these regions. As passive safety content per vehicle is also an indicator of our sales development, should these trends continue, the average value of passive safety systems per vehicle could decline.

We operate in a highly competitive market

The market for occupant restraint systems is highly competitive. We compete with a number of other companies that produce and sell similar products. Among other factors, our products compete on the basis of price, quality, manufacturing and distribution capability, design and performance, technological innovation, delivery, and service. Some of our competitors are subsidiaries (or divisions, units or similar) of companies that are larger and have greater financial and other resources than us. Some of our competitors may also have a "preferred status" as a result of special relationships or ownership interests with certain customers. Our ability to compete successfully depends, in large part, on our success in continuing to innovate and manufacture products that have commercial success with consumers, differentiating our products from those of our competitors, continuing to deliver quality products in the time frames required by our customers, and maintaining best-cost production. We continue to invest in technology and innovation which we believe will be critical to our long-term growth. Our ability to maintain and improve existing products, while successfully developing and introducing distinctive new and enhanced products that anticipate changing customer and consumer preferences and capitalize upon emerging technologies will be a significant factor in our ability to remain competitive. If we are unsuccessful or are less successful than our competitors in predicting the course of market development, developing innovative products, processes, and/or use of materials or adapting to new technologies or evolving regulatory, industry or customer requirements, we may be placed at a competitive disadvantage. For example, our customers are increasingly focused on developing electric vehicles. If we fail to be awarded business on electric vehicle models, it will harm our future business prospects. Our competitive environment continues to change, including increased competition from entrants outside the traditional automotive industry, creating uncertainty about the future competitive landscape. Given the competitive nature of our business, the amount of awards we are awarded relative to our peers may decrease over time. Additionally, OEMs rigorously evaluate our performance and products against those of our competitors on the basis of product quality, reliability and cost-effectiveness. If one or more of our OEM customers determine that they could achieve overall better financial results by incorporating a competitor's new or existing product, it could affect our ability to be competitive and may decrease our current market share. The inability to compete successfully could have a material adverse effect on our business, results of operations, and financial condition.

The discontinuation, lack of commercial success, or loss of business with respect to a particular vehicle model for which we are a significant supplier could reduce our sales and harm our business

A number of our customer contracts generally require us to supply a customer's annual requirements for a particular vehicle model and assembly facilities, rather than for manufacturing a specific quantity of products. Such contracts range from one year to the life of the model, which is generally four to seven years. These contracts are often subject to renegotiation, sometimes as frequent as on an annual basis, which may affect product pricing, and generally may be terminated by our customers at any time. Therefore, the discontinuation of, the loss of business with respect to, or a lack of commercial success of a particular vehicle model or brand for which we are a significant supplier could reduce our sales and harm our business prospects, operating results, cash flows, or financial condition.

We are working to expand our product offerings beyond light passenger vehicles to include other mobility safety solutions. If we are not successful in expanding our product offerings or if it takes longer or costs are more than expected, it could harm our business

The Company is working to expand its product offerings to focus on mobility safety solutions. Because mobility safety product offerings are currently in the development stages, it is difficult for us to anticipate the level of sales they may generate. The expansion of our product offering will require us to invest time and resources to develop innovative products, such as wearables and helmets, that keep pace with continuing changes in industry standards and to reach new customers who have rapidly changing preferences. Our product offerings might not receive customer acceptance if customer preferences shift to other products, and our future success depends in part on our ability to anticipate and respond to these changes. If we are not successful in expanding our product offerings or if it takes longer or costs are more than expected, it could negatively impact our financial results, competitive position, and future business prospects.

RISKS RELATED TO OUR BUSINESS

We may incur material losses and costs as a result of product liability, warranty, and recall claims that may be brought against us or our customers

We face risks related to product liability claims, warranty claims, and recalls in the event that any of our products actually or allegedly are defective, fail to perform as expected, or the use of our products results, or is alleged to result, in bodily injury and/or property damage. We may not be able to anticipate all of the possible performance or reliability problems that could arise with our products after they are released to the market. Additionally, increasing regulation and reporting requirements regarding potentially defective products, particularly in the U.S., may increase the possibility that we become involved in additional product liability or recall investigations or claims. See – “Our business may be adversely affected by changes in automotive safety regulations or concerns that drive further regulation of the automobile safety market”. Although we currently carry product liability and product recall insurance in excess of our self-insured amounts, no assurance can be made that such insurance will provide adequate coverage against potential claims, such insurance is available or will continue to be available in the appropriate markets, or that we will be able to obtain such insurance on acceptable terms in the future as the cost of such insurance has risen in recent years and the cost of our self-insurance program has risen as well. Although we have invested and will continue to invest in our engineering, design, and quality infrastructure, we cannot give any assurance that our products will not suffer from defects or other deficiencies or that we will not experience material warranty claims or product recalls. In the future, we could experience material warranty or product liability losses and incur significant costs to process and defend these claims. A successful claim brought against us in excess of available insurance coverage, if any, or a requirement to participate in any product recall, could have a material adverse effect on our operating results, cash flows, or financial condition. Future recalls could result in costs not covered by insurance in excess of our self-insurance, further government inquiries, litigation, reputational harm, and could divert management’s attention away from other matters. The main variables affecting the costs of a recall are the number of vehicles ultimately determined to be affected by the issue, the cost per vehicle associated with a recall, the determination of proportionate responsibility among the customer, the Company, and any relevant sub-suppliers, and actual insurance recoveries. Every vehicle manufacturer has its own practices regarding product recalls and other product liability actions relating to its suppliers, and the performance and remedial requirements vary between jurisdictions. Due to recall activity in the automotive industry over the past decade, some vehicle manufactures have become even more sensitive to product recall risks. As suppliers become more integrally involved in the vehicle design process and assume more of the vehicle assembly functions, vehicle manufacturers are increasingly looking to their suppliers for contribution when faced with recalls and product liability claims. Product recalls in our industry, even when they do not involve our products, can harm the reputations of our customers, competitors, and us, particularly if those recalls cause consumers to question the safety or reliability of products similar to those we produce. In addition, with global platforms and procedures, vehicle manufacturers are increasingly evaluating our quality performance on a global basis; any one or more quality, warranty or other recall issue(s) (including issues affecting few units and/or having a small financial impact) may cause a vehicle manufacturer to implement measures which may have a severe impact on our operations, such as a global, temporary or prolonged suspension of new orders. In addition, as our products more frequently use global designs and are based on or utilize the same or similar parts, components or solutions, there is a risk that the number of vehicles affected globally by a failure or defect will increase significantly with a corresponding increase in our costs. A warranty, recall or product liability claim brought against us in excess of our available insurance may have a material adverse effect on our business. Vehicle manufacturers are also increasingly requiring their outside suppliers to guarantee or warrant their products and bear the costs of repair and replacement of such products under new vehicle warranties. A vehicle manufacturer may attempt to hold us responsible for some or the entire repair or replacement costs of defective products under new vehicle warranties, when the product supplied did not perform as represented. Accordingly, the future costs of warranty claims by our customers may be material. However, the final amounts determined to be due related to these matters could differ materially from our recorded warranty estimates and our business prospects, operating results, cash flows or financial condition may be materially impacted as a result. In addition, as we adopt new technology, we face an inherent risk of exposure to the claims of others that we have allegedly violated their intellectual property rights. We cannot assure that we will not experience any material warranty, product liability or intellectual property claim losses in the future or that we will not incur significant costs to defend such claims. See “If our patents are declared invalid or our technology infringes on the proprietary rights of others, our ability to compete may be impaired”.

Escalating pricing pressures from our customers may adversely affect our business

The automotive industry continues to experience aggressive pricing pressure from customers. This trend is partly attributable to the major automobile manufacturers’ strong purchasing power. As with other automotive component manufacturers, we are often expected to quote fixed prices or are forced to accept prices with annual price reduction commitments for long-term sales arrangements or discounted reimbursements for engineering work. Price reductions have impacted our sales and profit margins and are expected to continue to do so in the future. Our future profitability will depend upon, among other things, our ability to continuously reduce our cost per unit and maintain our cost structure, enabling us to remain cost-competitive. Our profitability is also influenced by our success in designing and marketing technological improvements in automotive safety systems, which helps us offset price reductions by our customers. If we are unable to offset continued price reductions through improved operating efficiencies and reduced expenditures, these price reductions may have a material adverse effect on our business prospects, operating results, cash flows or financial condition.

We could experience disruption in our supply or delivery chain, which could cause one or more of our customers to halt or delay production

We, as with other component manufactures in the automotive industry, ship our products to customer vehicle assembly facilities throughout the world on a “just-in-time” basis in order for our customers to maintain low inventory levels. Our suppliers (external suppliers as well as our own production sites) use a similar method in providing raw materials to us. However, this “just-in-time” method makes the logistics supply chain in our industry very complex and vulnerable to disruption. Disruptions in our supply chain may result for many reasons, including closures of one of our own or one of our suppliers’ facilities or critical manufacturing lines due to strikes or other labor disputes, mechanical failures, electrical outages, fires, explosions, critical pollution levels, critical health and safety and other working conditions issues (including epidemics and pandemics, such as the coronavirus (COVID-19)), natural disasters political upheaval, as well as logistical complications due to labor disruptions, weather or natural disasters, acts of terrorism, mechanical failures, and legislation or regulation regarding the transport of hazardous goods. Additionally, we may experience disruptions if there are newly imposed trade restrictions or delays in customs processing, including if we are unable to obtain government authorization to export or import certain materials, including materials that may be viewed as dangerous such as the propellant used for our inflators. As we continue to expand in growth markets, the risk of such disruptions is heightened. The unavailability of even a single small subcomponent necessary to manufacture one of our products, for whatever reason, could force us to cease production of that product, possibly for a prolonged period. Similarly, a potential quality issue could force us to halt deliveries while we validate the products. Even when products are ready to be shipped, or have been shipped, delays may arise before they reach our customer. Also, similar difficulties for other suppliers may force our customers to halt production, which may in turn impact our sales shipments to such customers. When we fail to timely deliver, we may have to absorb our own costs for identifying and resolving the ultimate problem as well as expeditiously producing and shipping replacement components or products. Generally, we must also carry the costs associated with “catching up,” such as overtime and premium freight. If we are the cause of a customer being forced to halt production, the customer may seek to recoup all of its losses and expenses from us. These losses and expenses could be very significant and may include consequential losses such as lost profits. Where a customer halts production because of another supplier failing to deliver on time, we may not be fully compensated, if at all. Thus, any such supply chain disruptions could severely impact our operations and/or those of our customers and force us to halt production for prolonged periods of time which could expose us to material claims for compensation and have a material adverse effect on our business prospects, operating results, or financial condition.

Adverse developments affecting our suppliers could harm our profitability

Any significant disruption in our supplier relationships, particularly relationships with single-source suppliers, could harm our profitability. Furthermore, some of our suppliers may not be able to sufficiently manage the currency commodity cost volatility and/or sharply changing volumes while still performing as we expect. For example, recalls or field actions from our customers can stress the capacity of our supply chain and may inhibit our ability to timely deliver order volumes. We may incur costs as we try to make contingency plans to manage the risks for delivery delays, production delays, production issues or delivery of non-conforming products by our suppliers.

Changes in the source, cost, availability of and regulations pertaining to raw materials and components may adversely affect our profit margins

Our business uses a broad range of raw materials and components in the manufacture of our products, nearly all of which are generally available from a number of qualified suppliers. Our industry may be affected from time to time by limited supplies or price fluctuations of certain key components and materials. Strong worldwide demand for certain raw materials has had a significant impact on prices and short-term availability in recent years, including in 2022. Such price increases have and could materially increase our operating costs and materially and adversely affect our profit margin, as direct material costs amounted to approximately 52% of our net sales in 2022, of which approximately half is the raw material cost portion. Inflation is currently high world-wide and may continue for some time. Commercial negotiations with our customers and suppliers may not always offset all of the adverse impact of higher raw material, energy, labor, logistics, and commodity costs. Even where we are able to pass price increases along to our customer, there may be (i) a lapse of time before we are able to do so such that we must absorb the cost increase, and (ii) a negative impact on our relationships with such customers and suppliers which may limit our success in securing future awards from customers and securing acceptable supplies from suppliers. In addition, no assurances can be given that the magnitude and duration of such cost increases or any future cost increases could not have a larger adverse impact on our profitability and consolidated financial position than currently anticipated. Additionally, various government regulators require companies that manufacture products containing certain minerals and their derivatives that are known as “conflict minerals”, originating from the Democratic Republic of Congo or adjoining countries to diligence and report the source of such materials. There are significant resources associated with complying with these requirements, including diligence efforts to determine the sources of conflict minerals used in our products and potential changes to our processes or supplies as a consequence of such diligence efforts. As there may be only a limited number of suppliers able to offer certified “conflict free” conflict minerals, there can be no assurance that we will be able to obtain necessary conflict free minerals from such suppliers in sufficient quantities or at competitive prices. We may face reputational challenges if we determine that certain of our products contain minerals not determined to be conflict free or if we are unable to sufficiently verify the origins for all minerals used in our products through the procedures we may implement. Furthermore, our customers are also increasingly requiring us to track sustainable sources of certain raw materials, which also requires additional diligence efforts and there can be no assurance that we will be able to obtain these materials in a cost-efficient and sustainable manner. Accordingly, these rules and customer requirements may adversely affect our business prospects, operating results, cash flows or financial condition.

Our business could be materially and adversely affected if we lost any of our largest customers or if they were unable to pay their invoices

We are dependent on a few large customers with strong purchasing power. This is the result of customer consolidation in the last few decades. In 2022, our top five customers represented around 49% of our consolidated sales, and our largest customer contract accounted for around 2% of our consolidated sales. Although business with any given customer is typically split into several contracts (either on the basis of one contract per vehicle model or on a broader platform basis), the loss of business from any of our major customers (whether by lower overall demand for vehicles, cancellation of existing contracts or the failure to award us new business) could have a material adverse effect on our business, results of operations, and financial condition. Similarly, further consolidation of our customers in the future could make us more reliant upon a smaller group of customers for a significant portion of our consolidated sales and negatively impact our bargaining power when contracting with such customers. Customers may put us on a “new business hold,” which would limit our ability to quote or be awarded all or part of their future vehicle contracts if quality or other issues arise in the vehicles for which we were a supplier. Such new business holds range in length and scope and are generally accompanied by a certain set of remedial conditions that must be met before we are eligible to bid for new business. Meeting any such conditions within the prescribed timeframe may require additional Company resources. A failure to satisfy any such conditions may have a material adverse impact on our financial results in the long term. There is a risk that one or more of our major customers may be unable to pay our invoices as they become due or that a customer will simply refuse to make such payments given its financial difficulties. If a major customer would enter into bankruptcy proceedings or similar proceedings whereby contractual commitments are subject to stay of execution and the possibility of legal or other modification, or if a major customer otherwise successfully procures protection against us legally enforcing its obligations, it is likely, absent special relief such as having a “preferred status”, that we will be forced to record a substantial loss. Additional information concerning our major customers is included in Note 20, Segment Information, of the Consolidated Financial Statements in this Annual Report.

Our inability to effectively manage the timing, quality and costs of new program launches could adversely affect our financial performance

To compete effectively in the automotive supply industry, we must be able to launch new products to meet our customers' timing, performance, and quality standards. At times, we face an uneven number of launches and some launches, for various reasons, may have shortened launch lead times. We cannot provide assurance that we will be able to install and certify the equipment needed to produce products for new programs in time for the start of production, or that the transitioning of our manufacturing facilities and resources to full production for such new programs will not impact production rates or other operational efficiency measures at our facilities. In addition, we cannot provide assurance that our customers will execute on schedule the launch of their new product programs, for which we might supply products. Additionally, as a Tier 1 supplier, we must effectively coordinate the activities of numerous suppliers in order to launch programs successfully. Given the complexity of new program launches, especially involving new and innovative technologies, we may experience difficulties managing product quality, timeliness and associated costs. In addition, new program launches require a significant ramp up of costs; however, the sales related to these new programs generally are dependent upon the timing and success of the introduction of new vehicles by the Company's customers. Our inability to effectively manage the timing, quality and costs of these new program launches could adversely affect our business prospects, operating results, cash flows, or financial condition.

Changes in our product mix may impact our financial performance

We sell products that have varying profit margins. Our financial performance can be impacted depending on the mix of products we sell during a given period. Our earnings guidance, estimates and mid- and long-term financial targets assume a certain geographic sales mix as well as a product sales mix. If actual results vary significantly from this projected geographic and product mix of sales, our operating results and financial condition could be negatively impacted.

We are involved from time to time in legal proceedings and our business may suffer as a result of adverse outcomes of current or future legal proceedings

We are, from time to time, involved in litigation, regulatory proceedings and commercial or contractual disputes that may be significant. These matters may include, without limitation, disputes with our suppliers and customers, intellectual property claims, shareholder litigation, government investigations, class action lawsuits, personal injury claims, product liability claims, environmental issues, antitrust, customs and VAT disputes and employment and tax issues. In such matters, government agencies or private parties may seek to recover from us very large, indeterminate amounts in penalties or monetary damages (including, in some cases, treble or punitive damages) or seek to limit our operations in some way. For example, a U.S. federal court has entered an order requiring Autoliv to pay approximately \$118 million, approximately \$18 million in actual compensatory damages plus pre-judgment interest and \$100 million in punitive damages, because Autoliv manufactured the seatbelt that was involved in an accident. The Company has appealed the verdict. The possibility exists that claims may be asserted against us and their magnitude may remain unknown for long periods of time. These types of lawsuits could require a significant amount of management's time and attention and a substantial legal liability or adverse regulatory outcome and the substantial expenses to defend the litigation or regulatory proceedings may have a material adverse effect on our customer relationships, business prospects, reputation, operating results, cash flows and financial condition. No assurances can be given that such proceedings and claims will not have a material adverse impact on our profitability and consolidated financial position or that our established reserves or our available insurance will mitigate such impact.

We may be subject to civil antitrust litigation that could negatively impact our business

The Company may be subject to civil antitrust lawsuits in the future in countries that permit such civil claims, including lawsuits or other actions by our customers. The Company was previously the subject of an investigation by the European Commission ("EC") regarding possible anti-competitive behavior among certain suppliers to the automotive vehicle industry. The Company paid a fine to resolve these matters in 2019. As a result of the outcome of the EC investigation, we are and we could be subject to subsequent civil disputes with non-governmental third parties and civil or stockholder litigation stemming from the same facts and circumstances underlying the EC investigation. These types of lawsuits require significant management time and attention and could result in significant expenses as well as unfavorable outcomes that could have a material adverse impact on our customer relationships, business prospects, reputation, operating results, cash flows or financial condition, and our insurance may not mitigate such impact. See Note 17, Contingent Liabilities, to the Consolidated Financial Statements in this Annual Report.

Work stoppages, slow-downs or other labor issues at our customers' facilities or at our facilities could adversely affect our operations

Because the automotive industry relies heavily on "just-in-time" delivery of components during the assembly and manufacture of vehicles, a work stoppage or slow-down at one or more of the Company's facilities could have a material adverse effect on our business. Similarly, if any of our customers were to experience a work stoppage or slow-down, that customer may halt or limit the purchase of our products. Similarly, a work stoppage or slow-down at another supplier could interrupt production at one of our customers' facilities which would have the same effect. While labor contract negotiations at our facilities historically have rarely resulted in work stoppages, no assurances can be given that we will be able to negotiate acceptable contracts with these unions or that our failure to do so will not result in work stoppages. A work stoppage or other labor disruption at one or more of our facilities or our customers' facilities could cause us to shut down production facilities supplying these products, which could have a material adverse effect on our business, results of operations and financial condition.

Our ability to operate our company effectively could be impaired if we fail to attract and retain executive officers and other key personnel

Our ability to operate our business and implement our strategies effectively depends, in part, on the efforts of our executive officers and other key employees. In addition, our future success will depend on, among other factors, our ability to attract, develop and retain other qualified personnel, particularly engineers and other employees with software and technical expertise. The loss of the services of any of our executive officers or other key employees or the failure to attract, develop or retain other qualified personnel could have a material adverse effect on our business.

Restructuring, efficiency, and strategic initiatives and capacity alignments are complex and difficult and at any time additional restructuring steps may be necessary, possibly on short notice and at significant cost

Our restructuring, efficiency, and strategic initiatives and capacity alignments include efforts to adjust our manufacturing capacity and cost structure to meet current and projected operational and market requirements, including plant closures, transfer of sourcing to best cost countries, consolidation of our supplier base, and standardization of products to reduce our overhead costs and consolidate our operational centers. The successful implementation of our restructuring activities and capacity alignments will involve sourcing, logistics, technology and employment arrangements. Because these restructuring, efficiency, and strategic initiatives and capacity alignments can be complex, there may be difficulties or delays in the implementation of any such initiatives and capacity alignments or they may not be immediately effective, resulting in an adverse material impact on our performance. In addition, there is a risk that inflation, high-turnover rates, and increased competition may reduce the efficiencies now available in best-cost countries to levels that no longer allow for cost-beneficial restructuring opportunities. Therefore, there can be no assurances that any future restructurings or capacity alignments will be completed as planned or achieve the desired results. See Note 11, Restructuring, to the Consolidated Financial Statements in this Annual Report.

A prolonged recession and/or a downturn in our industry could result in us having insufficient funds to continue our operations and external financing may not be available to us or available only on materially different terms than what has historically been available

Our ability to generate cash from our operations is highly dependent on automotive sales and LVP, the global economy, and the economies of our important markets. If LVP were to remain on low levels for an extended period of time, we would experience a significantly negative cash flow. Similarly, if cash losses for customer defaults rise sharply, we would experience a negative cash flow. Such negative cash flow could result in our having insufficient funds to continue our operations unless we can procure external financing, which may not be possible. Our access to debt, securitization, or derivative markets around the world at competitive rates or in sufficient amounts could be affected by credit rating downgrades, market volatility, market disruption, regulatory requirements, or other factors. Our ability to obtain unsecured funding at a reasonable cost is dependent on our credit ratings or our perceived creditworthiness. Our current credit rating could be lowered as a result of us experiencing significant negative cash flows, increasing our indebtedness and leverage, or a dire financial outlook, which may affect our ability to procure financing. We may also for the same, or other reasons, find it difficult to secure new long-term credit facilities, at reasonable terms, when our principal credit facility expires in 2027. Further, even our existing unutilized credit facilities may not be available to us as agreed, or only at additional cost, if participating banks are unable to raise the necessary funds, where, for instance, financial markets are not functioning as expected or one or more banks in our principal credit facility syndicate were to default. As a result, we cannot assure you that we will continue to have sufficient liquidity to meet our operating needs. In the event that we do not have sufficient external financing, we may be required to seek additional capital, sell assets, reduce or cut back our operating activities or otherwise alter our business strategy. Information concerning our credit facilities and other financings are included in Item 7 in this Annual Report in the section headed "Treasury Activities" and in Note 13, Debt and Credit Agreements, to the Consolidated Financial Statements in this Annual Report.

Our indebtedness may harm our financial condition and results of operations

As of December 31, 2022, we have outstanding debt of \$1.8 billion. We may incur additional debt for a variety of reasons. Although our significant credit facilities and debt agreements do not have any financial covenants, our level of indebtedness will have several important effects on our future operations, including, without limitation: a portion of our cash flows from operations will be dedicated to the payment of any interest or could be used for amortization required with respect to outstanding indebtedness; increases in our outstanding indebtedness and leverage will increase our vulnerability to adverse changes in general economic and industry conditions, as well as to competitive pressure; depending on the levels of our outstanding debt, our ability to obtain additional financing for working capital, acquisitions, capital expenditures, general corporate and other purposes may be limited; and potential future tightening of the availability of capital both from financial institutions and the debt markets may have an adverse effect on our ability to access additional capital.

Governmental restrictions may impact our business adversely

Some of our customers are (or may be) owned by a governmental entity, receive various forms of governmental aid or support or are subject to governmental influence in other forms, which may impact us as a supplier to these customers. As a result, they may be required to partner with local entities or procure components from local suppliers to achieve a specific local content or be subject to other restrictions regarding localized content or ownership. The nature and form of any such restrictions or protections, whatever their basis, is very difficult to predict as is their potential impact. However, they are likely to be based on political rather than economical or operational considerations and may materially impact our business.

Impairment charges relating to our assets, goodwill and other intangible assets could adversely affect our financial performance

We periodically review the carrying value of our assets, goodwill and other intangible assets for impairment indicators. If one or more of our customers' facilities cease production or decrease their production volumes, the assets we carry related to our facilities serving such customers may decrease in value because we may no longer be able to utilize or realize them as intended. Where such decreases are significant, such impairments may have a material adverse impact on our financial results. We monitor the various factors that impact the valuation of our goodwill and other intangible assets, including expected future cash flow levels, global economic conditions, market price for our stock, and trends with our customers. Impairment of goodwill and other identifiable intangible assets may result from, among other things, deterioration in our performance and especially the cash flow performance of these goodwill assets, adverse market conditions and adverse changes in applicable laws or regulations. If there are changes in these circumstances or the other variables associated with the estimates, judgments and assumptions relating to the valuation of goodwill, when assessing the valuation of our goodwill items, we may determine that it is appropriate to write down a portion of our goodwill or intangible assets and record related non-cash impairment charges. In the event that we determine that we are required to write-down a portion of our goodwill items and other intangible assets and thereby record related non-cash impairment charges, our financial condition and operating results would be adversely affected. For additional information, see Part II, Item 7 "Management's Discussion and Analysis of Financial Condition and Results of Operations - Significant Accounting Policies and Critical Accounting Estimates – Goodwill and Intangibles".

We face risks related to our defined benefit pension plans and employee benefit plans, including the need for additional funding as well as higher costs and liabilities

Our defined benefit pension plans and employee benefit plans may require additional funding or give rise to higher related costs and liabilities which, in some circumstances, could reach material amounts and negatively affect our operating results. We are required to make certain year-end assumptions regarding our pension plans. Our pension obligations are dependent on several factors, including factors outside our control such as changes in interest rates, the market performance of the diversified investments underlying the pension plans, actuarial data and adjustments and an increase in the minimum funding requirements or other regulatory changes governing the plans. Adverse equity market conditions and volatility in the credit market may have an unfavorable impact on the value of our pension assets and our future estimated pension liabilities. Internal factors such as an adjustment to the level of benefits provided under the plans may also lead to an increase in our pension liability. If these or other internal and external risks were to occur, alone or in combination, our required contributions to the plans and the costs and net liabilities associated with the plans could increase substantially and have a material effect on our business. Information concerning our benefit plans is included in Note 18, Retirement Plans, of the Consolidated Financial Statements in this Annual Report.

We may not be able to, or we may decide not to, pay dividends or repurchase shares at a level anticipated by our shareholders, which could reduce shareholder returns

The extent to which we pay dividends on our common stock and repurchase our common stock in the future is at the discretion of our Board of Directors and depends upon a number of factors, including our earnings, financial condition, cash and capital needs, indebtedness and leverage, and general economic or business conditions. No assurance can be given that we will be able to or will choose to pay any dividends or repurchase any shares in the foreseeable future.

Cybersecurity incidents or other damage to our technology infrastructure could disrupt business operations, result in the loss of critical and confidential information, and adversely impact our reputation and operating results

We rely extensively on information technology ("IT") networks and systems, our global data centers and services provided over the internet to process, transmit and store electronic information, and to manage or support a variety of business processes or activities across our facilities worldwide. In addition, a greater number of our employees are working remotely which may increase cybersecurity vulnerabilities and risk to our IT networks and systems. The secure operation of our IT networks and systems and the proper processing and maintenance of this information are critical to our business operations. We have been, and likely will continue to be, subject to cyber-attacks. To date we have seen no material impact on our business from these attacks or events. Although we seek to deploy comprehensive security measures to prevent, detect, address and mitigate these threats, there has been an increased level of activity, and an associated level of sophistication, in cyber-attacks against large multinational companies. The ever-evolving threats mean we and our third-party service providers and vendors must continually evaluate and adapt our respective systems and processes and overall security environment, as well as those of any companies we acquire. There is no guarantee that these measures will be adequate to safeguard against all data security breaches, system compromises or misuses of data. Our security measures may be breached due to human or technological error, employee malfeasance, system malfunctions or attacks from uncoordinated individuals or sophisticated and targeted measures known as advanced persistent threats, directed at the Company, its products, its customers, its third-party service providers, and/or other entities with whom we do business. Because techniques used to obtain unauthorized access or to sabotage systems change frequently and generally are not recognized until they are launched against a target, we may be unable to anticipate these techniques or to implement adequate preventative measures. Disruptions and attacks on our IT systems or the systems of third parties storing our data or employee malfeasance or human or technological error could result in the misappropriation, loss, destruction or corruption of our critical data and confidential or proprietary information, personal information of our employees, the leakage of our or our customers' confidential information, improper use of our systems and networks, production downtimes and both internal and external supply shortages, which could have an adverse effect on our results of operations. It may also result in the theft of intellectual property or other misappropriation of assets, or otherwise compromise our confidential or proprietary information and disrupt our operations. The potential consequences of a material cybersecurity incident include reputational damage, theft of intellectual property, litigation with third parties, diminution in the value of our investment in research, development and engineering, diversion of the attention of management away from the operation of our business and increased cybersecurity protection and remediation costs, legal claims and liability, regulatory scrutiny, sanctions, fines or penalties (which may not be covered by our insurance policies), negative publicity, release of sensitive and/or confidential information, increases in operating expenses, or lost revenues which in turn could adversely affect our competitiveness and results of operations. To the extent that any disruption or security breach results in a misappropriation, loss, destruction or corruption of our customer's information, it could affect our relationships with our customers, create significant expense for us to investigate and remediate damage, lead to claims against the Company and ultimately harm our business. In addition, we may be required to incur significant costs to protect against damage caused by these disruptions or security breaches in the future. In addition, as the regulatory environment related to information security, data collection and use, and privacy becomes increasingly rigorous, with new and constantly changing requirements applicable to our business, compliance with those requirements could result in additional costs. Furthermore, our technology systems are vulnerable to damage or interruption from natural disasters, power loss and telecommunication failures. We continuously seek to maintain a robust program of information security and controls, however, any future significant compromise or breach of our data security, whether external or internal, or misuse of customer, associate, supplier or Company data, could result in significant costs, lost sales, fines, lawsuits, and damage to our reputation.

Third parties that maintain certain of our confidential and proprietary information could experience a cybersecurity incident

We rely on third parties to provide or maintain some of our IT systems, data centers and related services and do not exercise direct control over these systems. Despite the implementation of security measures at third party locations, these IT systems, data centers and cloud services are also vulnerable to security breaches or other disruptions. Additionally, we and certain of our third-party vendors, collect and store personal information in connection with human resources operations and other aspects of our business. While we obtain assurances that any third parties we provide data to will protect this information and, where we believe appropriate, monitor the protections employed by these third parties, there is a risk the confidentiality of data held by us or by third parties may be compromised and expose us to liability for such breach.

Global climate change could negatively affect our business

Increased public awareness and concern regarding global climate change will likely result in more regional and/or national requirements to reduce or mitigate the effects of greenhouse gas emissions. In addition, our shareholders and customers also expect us to reduce our greenhouse gas emissions. There continues to be a lack of consistent climate legislation, which creates economic and regulatory uncertainty. Any future regulations aimed at mitigating climate change may negatively impact the prices of raw materials and energy as well as the demand for certain of our customer's products which could in turn impact demand for our products and impact our results of operations. The costs of compliance and any changes to our operations mandated by new or amended laws, may be significant. We may also face unexpected delays in obtaining permits and approvals required by such laws in connection with our manufacturing facilities, which would hinder our operation of these facilities. Furthermore, any violations of these laws may result in substantial fines and penalties, remediation costs, third party damages, or a suspension or cessation of our operations. We also face physical and transition risks from climate change. The manifestations of climate change, such as extreme weather conditions or more frequent extreme weather events, including wildfires, flooding, water stress and extreme heat, could disrupt our operations, damage our facilities, disrupt our supply chain, including our customers or suppliers, impact the availability and cost of materials needed for manufacturing or increase insurance and other operating costs. As a result, severe weather or a natural disaster that results in a prolonged disruption to our operations, or the operations of our customers or suppliers, could have a material adverse effect on our operating results, cash flows or financial condition.

Our goals, targets and ambitions related to sustainability and emissions reduction, and our public statements and disclosures regarding them, expose us to numerous risks

We have developed, and will continue to develop and set, goals, targets, ambitions and other objectives related to sustainability matters, including our net-zero emission targets both for ourselves and our supply chain. Some of these are based on our internal scenario analysis, which may not prove to be accurate and carries inherent uncertainties. Statements related to these goals, targets, ambitions and objectives reflect our current plans and do not constitute a guarantee that they will be achieved. Our efforts to research, establish, accomplish, and accurately report on these goals, targets, and objectives expose us to numerous operational, reputational, financial, legal, and other risks. Additionally, greenhouse gas emissions, particular emissions that come from individuals and entities up and down the value chain (otherwise known as Scope 3 emissions), are very difficult to estimate and our estimates may be materially different than actual emissions. The manner in which we estimate and disclose Scope 3 emissions may differ from other companies, and currently, we do not include downstream Scope 3 emissions in our targets and ambitions. If future governmental regulations require us to modify the basis of our Scope 3 emissions disclosure, our historically disclosed Scope 3 emissions may change materially. Our ability to achieve any stated goal, target, ambition or objective, including with respect to emissions reduction, is subject to numerous factors and conditions, some of which are outside of our control. For example, we have announced that we are collaborating with Polestar to develop a climate neutral car. Such an endeavor requires the innovation and collaboration with a number of partners and is subject to certain inherent risks, including the timetable in which it is achieved. We may also have to purchase carbon offsets in order to meet our targets and objectives, which may not be available or may no longer be considered acceptable to use to meet such targets.

Our business may face increased scrutiny from investors and other stakeholders related to our sustainability activities, including the goals, targets, and objectives that we announce, and our methodologies and timelines for pursuing them. If our sustainability practices do not meet investor or other stakeholder expectations and standards, which continue to evolve, our reputation, our ability to attract or retain employees, and our attractiveness as an investment or business partner could be negatively affected. Similarly, our failure or perceived failure to pursue or fulfill our sustainability-focused goals, targets, ambitions and objectives, to comply with ethical, environmental, or other standards, regulations, or expectations, or to satisfy various reporting standards with respect to these matters, within the timelines we announce, or at all, could adversely affect our business or reputation, as well as expose us to government enforcement actions and private litigation.

RISKS RELATED TO INTERNATIONAL OPERATIONS

Our business is exposed to risks inherent in international operations

We currently conduct operations in various countries and jurisdictions, including locating certain of our manufacturing and distribution facilities internationally, which subjects us to the legal, political, regulatory and social requirements and economic conditions in these jurisdictions. Some of these countries are considered growth markets and emerging markets. International sales and operations, especially in growth markets, subject us to certain risks inherent in doing business abroad, including: exposure to local economic conditions; unexpected changes in laws, regulations, trade, or monetary or fiscal policy, including interest rates, foreign currency exchange rates, and changes in inflation rates; foreign tax consequences; inability to collect, or delays in collecting, value-added taxes and/or other receivables associated with remittances and other payments by subsidiaries; exposure to local political turmoil and challenging labor conditions; changes in general economic and political conditions in countries where we operate, particularly in emerging markets; expropriation and nationalization; enforcing legal agreements or collecting receivables through foreign legal systems; wage inflation; currency controls, including lack of liquidity in foreign currency due to governmental restrictions, trade protection policies and currency controls, which may create difficulty in repatriating profits or making other remittances; compliance with the requirements of an increasing body of applicable anti-bribery laws; reduced intellectual property protection in various markets; investment restrictions or requirements; and the imposition of product tariffs and the burden of complying with a wide variety of international and U.S. export laws. The Company is subject to taxation in the U.S. and numerous foreign jurisdictions. The Organization for Economic Co-operation and Development ("OECD") continues its base erosion and profit shifting ("BEPS") project begun in 2015 with new proposals for a global minimum tax, further development of a coordinated set of rules for taxation and the allocation of taxing rights between jurisdictions. These proposals, if adopted by countries in which we operate, could result in changes to tax policies, including transfer pricing policies, that could ultimately impact our tax liabilities. On December 12, 2022, the European Union member states agreed to implement the OECD's Pillar 2 global corporate minimum tax at a rate of 15% on companies with revenues of at least \$790 million, which would go into effect in 2024. Similarly, the United States passed the Inflation Reduction Act of 2022, which also imposes, among other things, a 15% corporate minimum tax for taxable years beginning after December 31, 2022, on certain U.S. based companies that have average revenues over a three-year period of at least \$1 billion. Other countries including the United Kingdom, Switzerland, Canada, Australia and South Korea are also actively considering changes to their tax laws to adopt certain parts of the OECD's proposals. The timing or impact of these proposals and recommendations is unclear at this point.

Changes in tax laws or policies by the U.S. or foreign jurisdictions could result in a higher effective tax rate on our worldwide earnings, and any such change could have a material adverse effect on our business prospects, cash flows, operating results and financial condition. Our international operations also depend upon favorable trade relations between the countries where we manufacture and sell products and those foreign countries in which our customers and suppliers have operations. Changes in national policy, other governmental action related to tariffs or international trade agreements, changes in social, political regulatory, and economic conditions or in laws and policies governing foreign trade, manufacturing, development and investment in the territories and countries where the Company currently manufactures and sells products, and any resulting negative sentiments towards the Company as a result of such changes could depress economic activity and restrict our access to suppliers or customers and have a material adverse effect on our cash flows, operating results and financial condition. Increasing our manufacturing footprint in the growth markets and our business relationships with automotive manufacturers in these markets are particularly important elements of our strategy. As a result, our exposure to the risks described above may be greater in the future, and our exposure to risks associated with developing countries, such as the risk of political upheaval and reliability of local infrastructure, may increase.

Our foreign operations may subject us to risks relating to laws governing international relations

Due to our global operations, we are subject to many laws governing international relations (including, but not limited to, the Foreign Corrupt Practices Act, and other anti-bribery regulations in foreign jurisdictions where we do business), which prohibit improper payments to government officials and restrict where and how we can do business, what information or products we can supply to certain countries and what information we can provide to authorities in governmental authorities. We also export components and products that are subject to certain trade-related U.S. laws, including the U.S. Export Administration Act and various economic sanctions programs administered by the U.S. Treasury's Office of Foreign Assets Control. Although we have procedures and policies in place that should mitigate the risk of violating these laws, there is no guarantee that they will be sufficiently effective. If and when we acquire new businesses, we may not be able to ensure that the pre-existing controls and procedures meant to prevent violations of these laws were effective, and violations may occur if we are unable to timely implement corrective and effective controls and procedures when integrating newly acquired businesses. Any allegations of noncompliance with these laws could harm our reputation, divert management attention and result in significant expenses, and could therefore materially harm our business prospects, operating results and financial condition.

Our business in Asia is subject to aggressive competition and is sensitive to economic, market, and political conditions

We operate in the automotive supply market throughout Asia including the highly competitive markets in China, South Korea, and India. In each of these markets we face competition from both international and smaller domestic manufacturers. Due to the significance of the Asian markets for our profit and growth, we are exposed to risks in China, South Korea, and India. We anticipate that additional competitors, both international and domestic, may seek to enter the Chinese, South Korean, and/or Indian markets resulting in increased competition. Increased competition may result in lower sales volumes, price reductions, reduced margins and our inability to gain or hold market share. There have been periods of increased market volatility and moderation in the levels of economic growth in China, which resulted in periods of lower automotive production growth rates in China than those previously experienced. Our business in Asia is sensitive to economic and market conditions that drive automotive sales volumes in China, South Korea, and India and may be impacted if there are reductions in vehicle demand in those markets. Additionally, the COVID-19 pandemic has created significant volatility throughout Asia, particularly in China, which has led to significant reduced economic activity and employment and has disrupted, and may continue to disrupt, the global automotive industry and customer sales, production volumes, and purchases of light vehicles by end-consumers. Although the Chinese government began rolling back its "Zero-Covid" policies and re-opening its economy in late 2022, if COVID-19 continues to spread or re-emerges in China, or other major markets in Asia, it may cause disruptions in the manufacturing, delivery, and overall supply chains of automobile manufacturers and suppliers. There are also trade and political tensions between China and other countries in the western world. If we are unable to maintain our position in the Asian markets, the pace of growth slows, or vehicle sales in these markets decrease, our business prospects, operating results and financial condition could be materially adversely affected.

Our business in Europe is sensitive to economic and market conditions

We operate in the automotive supply market throughout Europe and are increasingly subject to the risks arising from adverse changes in the European economy. A significant deterioration in economic conditions, increased volatility, further declines in the European credit, equity, and foreign currency markets or geopolitical disruptions, including the war in Ukraine, could have negative impacts on our business operations in Europe and may lead to delays in or cancellations of customer orders. We also face competition from both international and smaller domestic manufacturers who may seek to enter the European markets resulting in increased competition. Increased competition may result in lower sales volumes, price reductions, reduced margins, and our inability to gain or hold market share.

Global integration may result in additional risks

Because of our efforts to manage costs by integrating our operations globally, we face the additional risk that, should any of the other risks discussed herein materialize, the negative effects could be more pronounced. For example, while supply delays of a component have typically only affected a few customer vehicle models, such a delay could now affect several vehicle models of several customers in several geographic areas. Similarly, any recall or warranty issue we face due to a product defect or failure is now more likely to involve a larger number of units in several geographic areas.

Exchange rate risks

As a result of our global presence, a significant portion of our revenues and expenses are denominated in currencies other than the U.S. dollar. We are therefore subject to foreign currency risks and foreign exchange exposure. Such risks and exposures include: transaction exposure, which arises because the cost of a product originates in one currency and the product is sold in another currency; revaluation effects, which arise from valuation of assets denominated in other currencies than the reporting currency of each unit; translation exposure in the income statement, which arises when the income statements of non-U.S. subsidiaries are translated into U.S. dollars; translation exposure in the balance sheet, which arises when the balance sheets of non-U.S. subsidiaries are translated into U.S. dollars; and changes in the reported U.S. dollar amounts of cash flows. We cannot predict exchange rate volatility or the extent of its impact on our future financial results. We typically denominate foreign transactions in foreign currencies to achieve a natural hedge. However, a natural hedge cannot be achieved for all our currency flows; therefore, a net transaction exposure remains within the group. The net exposure can be significant and creates a transaction exposure risk for the Company. The Company does not hedge translation exposure. However, we do engage in foreign exchange rate hedging from time to time related to foreign currency transactions. For additional information, see Part II, Item 7A. Quantitative and Qualitative Disclosures about Market Risk - Currency risks.

RISKS RELATED TO ACQUISITIONS

We face risks in connection with acquisitions, joint ventures, partnerships, and other strategic transactions

Our growth has been enhanced through strategic transactions, including acquisitions of businesses, products and technologies, partnerships, strategic alliances, and joint development agreements that we believe will complement our business. We regularly evaluate acquisition opportunities, frequently engage in acquisition discussions, conduct due diligence activities in connection with possible acquisitions, and, where appropriate, engage in acquisition negotiations. We may not be able to successfully identify suitable acquisition and joint venture candidates or complete transactions on acceptable terms, integrate acquired operations into our existing operations or expand into new markets. Our failure to identify suitable strategic transactions may restrict our ability to grow our business. These strategic transactions also involve numerous additional risks to us and our investors, including: risks related to retaining acquired management and employees; difficulties in integrating acquired technologies, products, operations, services and personnel with our existing businesses; diversion of our management's attention from other business concerns; assumption of contingent liabilities; potential adverse financial impacts, including from the amortization of expenses related to intangible assets and from potential impairment of goodwill; incurrence of indebtedness; and potential damage to existing customer relationships or lack of customer acceptance or inability to attract new customers as a result of these transactions. In the future, we may pursue acquisitions of businesses or products that are complementary to our business but for which we have historically had little or no direct experience. These transactions can involve significant challenges and risks as well as significant time and resources that may divert management's attention from other business activities. If we fail to adequately manage these risks, the acquisitions and other strategic transactions may not result in revenue growth, operational synergies or service or technology enhancements, which could adversely affect our financial condition.

RISKS RELATED TO INTELLECTUAL PROPERTY

If our patents are declared invalid or our technology infringes on the proprietary rights of others, our ability to compete may be impaired

We have developed a considerable amount of proprietary technology related to automotive safety systems and rely on a number of patents to protect such technology. Our intellectual property plays an important role in maintaining our competitive position in a number of the markets we serve. At present, we hold more than 6,600 patents and patent applications covering a large number of innovations and product ideas, mainly in the fields of seatbelt and airbag technologies. In addition to our in-house research and development efforts, we seek to acquire rights to new intellectual property through corporate acquisitions, asset acquisitions, licensing and joint venture arrangements. Our patents and licenses expire on various dates during the period from 2023 to 2042. We do not expect the expiration of any single patent or license to have a material adverse effect on our business, operating results and financial condition. Developments or assertions by or against us relating to intellectual property rights could negatively impact our business. We primarily protect our innovations with patents and vigorously protect and defend our patents, trademarks and know-how against infringement and unauthorized use. If we are not able to protect our intellectual property and our proprietary rights and technology, we could lose those rights and incur substantial costs policing and defending those rights. We also generate license revenue from these patents, which we may lose if we do not adequately protect our intellectual property and proprietary rights. Our means of protecting our intellectual property, proprietary rights and technology may not be adequate, and our competitors may independently develop technologies that are similar or superior to our proprietary technologies, duplicate our technologies, or design around the patents we own or license. In addition, the laws of some foreign countries do not protect our proprietary rights to as great an extent as the laws of the U.S. and we may encounter significant problems in protecting and defending our intellectual property rights in certain foreign jurisdictions. This could make it difficult for us to stop the infringement of our patents or misappropriation of our other intellectual property rights. Proceedings to enforce our patent rights in foreign jurisdictions could result in substantial costs and divert our efforts and attention from other aspects of our business. Accordingly, our efforts to protect our intellectual property rights in such countries may be inadequate.

We may not be able to protect our proprietary technology and intellectual property rights, which could result in the loss of our rights or increased costs.

Although we believe that our products and technology do not infringe the proprietary rights of others, third parties may assert infringement claims against us in the future. Additionally, we license from third parties proprietary technology covered by patents, and we cannot be certain that any such patents will not be challenged, invalidated, or circumvented. Such licenses may also be non-exclusive, meaning our competition may also be able to access such technology. Further, we expect to continue to expand our products and services and expand into new businesses, including through developing new products, acquisitions, joint ventures and joint development agreements, which could increase our exposure to patent and other intellectual property claims from competitors and other parties. If claims alleging patent, copyright or trademark infringement are brought against us and are successfully prosecuted against us, they could result in substantial costs. If a successful claim is made against us and we fail to develop non-infringing technology, our business, operating results and financial condition could be materially adversely affected. In addition, certain of our products utilize components that are developed by third parties and licensed to us. If claims alleging patent, copyright or trademark infringement are brought against such licensors and successfully prosecuted, they could result in substantial costs, and we may not be able to replace the functions provided by these licensors. Alternate sources for the technology currently licensed to us may not be available in a timely manner, may not provide the same functions as currently provided or may be more expensive than products currently used. We may develop proprietary information through our in-house research and development efforts, consulting arrangements or research collaborations with other entities or organizations. We may seek to protect this proprietary information by entering into confidentiality agreements or consulting, services or employment agreements that contain non-disclosure and non-use provisions with our employees, consultants, scientific advisors and other third parties. However, we may fail to enter into the necessary agreements, and even if entered into, these agreements may be breached or may otherwise fail to prevent disclosure, third-party infringement or misappropriation of our proprietary information.

We may not be able to respond quickly enough to changes in technology and technological risks and to develop our intellectual property into commercially viable products

Changes in legislative, regulatory, or industry requirements or in competitive technologies may render certain of our products obsolete or less attractive to our customers. We currently license certain proprietary technology to third parties and, if such technology becomes obsolete or less attractive, those licensees could terminate our license agreements, which could adversely affect our results of operations. Our ability to anticipate changes in technology and regulatory standards and to successfully develop and introduce new and enhanced products on a timely basis will be a significant factor in our ability to remain competitive. We cannot provide assurance that we will be able to achieve the technological advances that may be necessary for us to remain competitive or that certain of our products will not become obsolete. We are also subject to the risks generally associated with new product introductions and applications, including lack of market acceptance, delays in product development and failure of products to operate properly. As part of our business strategy, we may from time to time seek to acquire businesses or assets that provide us with additional intellectual property. We may experience problems integrating acquired technologies into our existing technologies and products, and such acquired intellectual property may be subject to known or contingent liabilities such as infringement claims.

Some of our products and technologies may use “open source” software, which may restrict how we use or distribute our products or require that we release the source code of certain products subject to those licenses

Some of our products and technologies may incorporate software licensed under so-called “open source” licenses. In addition to risks related to license requirements, usage of open source software can lead to greater risks than use of third-party commercial software, as open source licensors generally do not provide warranties or controls on origin of the software. Additionally, open source licenses typically require that source code subject to the license be made available to the public and that any modifications or derivative works to open source software continue to be licensed under open source licenses. These open source licenses typically mandate that proprietary software, when combined in specific ways with open source software, become subject to the open source license. If we combine our proprietary software in such ways with open source software, we could be required to release the source code of our proprietary software. We take steps to ensure that our proprietary software is not combined with, and does not incorporate, open source software in ways that would require our proprietary software to be subject to an open source license. However, few courts have interpreted open source licenses; therefore the manner in which these licenses may be interpreted and enforced is subject to some uncertainty.

RISKS RELATED TO GOVERNMENT REGULATIONS AND TAXES

Our business may be adversely affected by laws or regulations, including environmental, occupational health and safety, and other governmental regulations

We are subject to various federal, state, local and foreign laws and regulations, including those related to the requirements of environmental, occupational health and safety, financial, and other matters. We cannot predict the substance or impact of pending or future legislation or regulations, or the application thereof. The introduction of new laws or regulations or changes in existing laws or regulations, or the interpretations thereof, could increase the costs of doing business for us or our customers or suppliers or restrict our actions and adversely affect our business prospects, operating results, cash flows or financial condition. Our operations are subject to environmental and safety laws and regulations governing, among other things, emissions to air, discharges to waters and the generation, handling, storage, transportation, treatment and disposal of waste and other materials. The operation of automotive parts manufacturing facilities entails risks in these areas, and we cannot assure that we will not incur material costs or liabilities as a result. Additionally, environmental laws, regulations, and permits and the enforcement thereof change frequently and have tended to become increasingly stringent over time, which may necessitate substantial capital expenditures or operating costs or may require changes of production processes. Although we have no known pending material environmental issues, there is no assurance that we will not be adversely impacted by any environmental costs, liabilities, or claims in the future either under present laws and regulations or those that may be adopted or imposed in the future. Our costs, liabilities, and obligations relating to environmental matters may have a material adverse effect on our business, operating results, cash flows, or financial condition. Our facilities in the U.S. are subject to regulation by the Occupational Safety and Health Administration (“OSHA”), which regulates the protection of the health and safety of workers. In addition, the OSHA hazard communication standard requires that we maintain information about hazardous materials used or produced in our operations and that we provide this information to employees, state and local governmental authorities and local residents. We are also subject to occupational safety regulations in other countries. Our failure to comply with government occupational safety regulations, including OSHA requirements, or general industry standards relating to employee health and safety, keep adequate records or monitor occupational exposure to regulated substances could expose us to liability, enforcement, and fines and penalties, and could have a material adverse effect on our business, operating results, cash flows, or financial condition. Although we employ safety procedures in the design and operation of our facilities, there is a risk that an accident or injury to one of our employees could occur in one of our facilities. Any accident or injury to our employees could result in litigation, manufacturing delays and harm to our reputation, which could negatively affect our business, operating results, and financial condition.

Our business may be adversely affected by changes in automotive safety regulations or concerns that drive further regulation of the automobile safety market

Government vehicle safety regulations are a key driver in our business. Historically, these regulations have imposed ever more stringent safety regulations for vehicles. Safety regulations have a positive impact on driver awareness and acceptance of automotive safety products and technology. These more stringent safety regulations often require vehicles to have more safety content per vehicle and more advanced safety products, which has thus been a driver of growth in our business. However, these regulations are subject to change based on a number of factors that are not within our control, including new scientific or medical data, adverse publicity regarding the industry recalls and safety risks of airbags or seatbelts (for instance, to children and small adults), domestic and foreign political developments or considerations, and litigation relating to our products and our competitors' products. Changes in government regulations in response to these and other considerations could have a severe impact on our business. Although we believe that over time safety will continue to be a regulatory priority, if government priorities shift and we are unable to adapt to changing regulations, our business may suffer material adverse effects. The regulatory obligation of complying with safety regulations could increase as federal and local regulators impose more stringent compliance and reporting requirements in response to product recalls and safety issues in our industry. We are subject to existing stringent requirements under the National Traffic and Motor Vehicle Safety Act of 1966 (the "Vehicle Safety Act"), including a duty to report, subject to strict timing requirements, safety defects with our products. The Vehicle Safety Act imposes potentially significant civil penalties for violations including the failure to comply with such reporting actions. We are also subject to the existing U.S. Transportation Recall Enhancement, Accountability and Documentation (TREAD) Act, which requires equipment manufacturers, such as Autoliv, to comply with "Early Warning" requirements by reporting certain information to the National Highway Traffic Safety Administration ("NHTSA") such as: information related to defects or reports of injury related to our products. TREAD imposes criminal liability for violating such requirements if a defect subsequently causes death or bodily injury. In addition, the Vehicle Safety Act authorizes NHTSA to require a manufacturer to recall and repair vehicles that contain safety defects or fail to comply with U.S. federal motor vehicle safety standards. Sales into foreign countries may be subject to similar regulations. Due to the record recall of airbag inflators of one of our competitors, NHTSA has become more active in requesting information from suppliers and vehicle manufacturers regarding potential product defects and we expect that to continue or increase under the current U.S. presidential administration.

Negative or unexpected tax developments could adversely affect our effective tax rate, operating results and financial condition

Changes in, or changes in the application of, U.S. or foreign tax laws, regulations or accounting principles with respect to matters such as tax base, tax rates, transfer pricing, dividends and restrictions on certain forms of tax relief or limitations on favorable tax treatment could affect the calculation of our income taxes and other tax liabilities, our effective tax rate, and the carrying value of our deferred tax assets. Our annual tax rate is based on our income and the tax laws in the jurisdictions in which we operate. Because of our global operations we face uncertainties and judgments in the application of complex tax regulations in a multitude of jurisdictions. Significant judgment and estimation is required in determining our effective tax rate and in evaluating our tax positions, in many cases where the ultimate tax determination is uncertain. Although we believe that our tax estimates are reasonable, the final determination of our tax liability may be different from what is reflected in our historical income tax provisions and accruals. We are regularly examined by tax authorities around the world and in a number of jurisdictions, we are currently under examination, which inherently creates uncertainty. Although we periodically assess the likelihood of adverse outcomes, negative or unexpected results from one or more of such reviews and audits, including any related interest or penalties imposed by governmental authorities, could increase our effective tax rate and adversely impact our operating results, cash flows or financial condition. The effective tax rates used for interim reporting are based on our projected full-year geographic earnings mix and take into account projected tax costs on intercompany dividends from lower tier subsidiaries. Changes in currency exchange rates, earnings mix among taxing jurisdictions, or the ability of our subsidiaries to pay dividends could impact our reported effective tax rates, or cause fluctuations in the tax rate from quarter to quarter. Certain anti-trust judgements or settlements may not be tax deductible, which could have a material negative impact to our annual tax rate. A number of other factors may also increase our effective tax rate, which could have an adverse impact on our profitability and operating results. Due to our numerous foreign operations, our tax rate may be impacted by our global mix of earnings if our pre-tax income is lower than anticipated in countries with lower statutory tax rates and/or is higher than anticipated in countries with higher statutory tax rates. Based on U.S. regulatory rules, we do not record current or deferred tax liabilities on permanent investments in our foreign subsidiaries. See Note 5, Income Taxes, to the Consolidated Financial Statements in this Annual Report.

We may not be able to fully realize our deferred tax assets

We currently carry deferred tax assets, net of valuation allowances, resulting from deductible temporary differences and tax loss carry-forwards, both of which will reduce taxable income in the future. However, deferred tax assets may only be realized against taxable income. The amount of our deferred tax assets could be reduced, from time to time, due to adverse changes in our operations or in estimates of future taxable income from operations during the carry-forward period as a result of a deterioration in market conditions or other circumstances. Any such reduction would adversely affect our income in the period of the adjustment. Additional information on our deferred tax assets is included in Note 5, Income Taxes, to the Consolidated Financial Statements in this Annual Report.

RISKS RELATED TO THE SEPARATION OF VEONEER

We could incur significant liability if the separation is determined to be a taxable transaction

We have received an opinion of outside counsel to the effect that, for U.S. federal income tax purposes, the separation should qualify, for both Autoliv and its stockholders, as a reorganization within the meaning of Sections 368(a)(1)(D) and 355 of the U.S. Internal Revenue Code of 1986, as amended. The opinion is based on and relies on, among other things, certain facts and assumptions, as well as certain representations, statements and undertakings of Autoliv and Veoneer, Inc. ("Veoneer") including those relating to the past and future conduct of Autoliv and Veoneer. If any of these facts, assumptions, representations, statements or undertakings is, or becomes, inaccurate or incomplete, reliance on the opinion may be affected. An opinion of outside counsel represents their legal judgment but is not binding on the IRS or any court. Accordingly, there can be no assurance that the IRS will not challenge the conclusions reflected in the opinion or that a court would not sustain such a challenge.

Potential indemnification obligations to Veoneer or a refusal of Veoneer to indemnify us pursuant to the agreements executed in connection with the internal reorganization and spin-off could materially adversely affect us

The transaction agreements we entered into with Veoneer in connection with the internal reorganization and the spin-off provide for cross-indemnities that require Autoliv and Veoneer to bear financial responsibility for each company's business prior to the internal reorganization or spin-off, as applicable, and to indemnify the other party in connection with a breach of such party of the transaction agreements; provided, however, certain warranty, recall and product liabilities for electronics products manufactured prior to the completion of the internal reorganization have been retained by us and we will indemnify Veoneer for any losses associated with such warranty, recall or product liabilities pursuant to the distribution agreement entered into as part of the spin-off. Any indemnities that we are required to provide to Veoneer may be significant and could negatively affect our business. In addition, there can be no assurance that the indemnities from Veoneer will be sufficient to protect us against the full amount of any potential liabilities. Even if we do succeed in recovering from Veoneer any amounts for which we are held liable, we may be temporarily required to bear these losses ourselves. Additionally, Veoneer was acquired by SSW Partners on April 1, 2022 which may impact our ability to recover any amounts from Veoneer pursuant to the transaction agreements. Each of these risks could have a material adverse effect on our business, operating results and financial condition.

Item 1B. Unresolved Staff Comments

Not applicable.

Item 2. Properties

Autoliv's principal executive offices are located at Klarabergsviadukten 70, Section B7, SE-111 64, Stockholm, Sweden. Autoliv's various businesses operate in a number of production facilities and offices. Autoliv believes that its properties are adequately maintained and suitable for their intended use and that the Company's production facilities have adequate capacity for the Company's current and foreseeable needs. All of Autoliv's production facilities and offices are owned or leased by operating (either subsidiary or joint venture) companies.

AUTOLIV MANUFACTURING FACILITIES

Country/Company	Location of Facility	Items produced at Facility	Owned/Leased
Brazil			
Autoliv do Brasil Ltda.	Taubaté	Seatbelts, airbags, steering wheels and seatbelt webbing	Owned
Canada			
Autoliv Canada, Inc.	Tilbury	Airbag cushions	Owned
VOA Canada, Inc.	Collingwood	Seatbelt webbing	Owned
China			
Autoliv (Baoding) Vehicle Safety Systems Co., Ltd.	Baoding	Airbags	Leased
Autoliv (Changchun) Vehicle Safety Systems Co., Ltd.	Changchun	Airbags and seatbelts	Owned
Autoliv (China) Steering Wheel Co., Ltd.	Fengxian/Shanghai	Steering wheels	Owned
Autoliv (Guangzhou) Vehicle Safety Systems Co., Ltd.	Guangzhou	Airbags and seatbelts	Owned
Autoliv (Nanjing) Vehicle Safety Systems Co., Ltd.	Nanjing	Seatbelts	Owned
Autoliv Shenda (Nanjing) Automotive Components Co., Ltd.	Nanjing	Seatbelt webbing	Owned
Autoliv (Shanghai) Vehicle Safety Systems Co., Ltd.	Shanghai	Airbags	Owned
Autoliv Shenda (Tai Cang) Automotive Safety Systems Co., Ltd.	Shanghai	Seatbelt webbing	Owned
Autoliv (Jiangsu) Automotive Safety Components Co., Ltd.	Jintan	Propellant, Airbag initiators and Airbag inflators	Owned
Autoliv (China) Automotive Safety Systems Co., Ltd.	Nantong	Airbag cushions	Owned
Mei-An Autoliv Co., Ltd.	Taipei	Seatbelts and airbags	Leased
Estonia			
AS Norma	Tallinn	Seatbelts and belt components	Owned
France			
Autoliv France SNC	Gournay-en-Bray	Airbags	Owned
Autoliv Isodelta SAS	Chiré-en-Montreuil	Steering wheels and covers	Owned
Livbag SAS	Pont-de-Buis	Airbag inflators	Owned
N.C.S. Pyrotechnie et Technologies SAS	Survilliers	Airbag initiators and seatbelt micro gas generators	Owned
Germany			
Autoliv B.V. & Co. KG	Elmshorn	Seatbelts	Owned
Hungary			
Autoliv Kft.	Sopronkövesd	Seatbelts	Owned
India			
Autoliv India Private Ltd.	Bangalore	Seatbelts, airbags	Owned
	Mysore	Seatbelt webbing and Airbag Cushions	Owned
	Badli	Airbags and steering wheels	Leased
Indonesia			
P.T. Autoliv Indonesia	Jakarta	Seatbelts and steering wheels	Owned
Japan			
Autoliv Japan Ltd.	Atsugi	Steering wheels	Leased
	Hiroshima	Airbags and steering wheels	Owned
	Takeotoyo	Airbag inflators	Leased
	Tsukuba	Airbags and seatbelts	Owned
Malaysia			
Autoliv-Hiroto Sdn Bhd	Kuala Lumpur	Seatbelts, airbags and steering wheels	Owned

Mexico			
Autoliv Mexico East S.A. de C.V.	Matamoros	Steering wheels	Owned
Autoliv Mexico S.A. de C.V.	Lerma	Seatbelts	Owned
Autoliv Safety Technology de Mexico S.A. de C.V.	Tijuana	Seatbelts	Leased
Autoliv Steering Wheels Mexico S. de R.L. de C.V.	Querétaro	Airbag cushions	Leased
Autoliv Steering Wheels Mexico S. de R.L. de C.V.	Querétaro	Airbags	Leased
Autoliv Mexico S.A. de C.V.	Aguascalientes	Steering wheels	Owned
Philippines			
Autoliv Cebu Safety Manufacturing, Inc.	Cebu	Steering wheels	Owned
Poland			
Autoliv Poland Sp. zo.o.	Olawa	Airbag cushions	Owned
	Jelcz-Laskowice	Airbags	Owned
Romania			
Autoliv Romania S.R.L.	Brasov	Seatbelts, seatbelt webbing, seatbelt components, airbag inflators, steering wheels	Owned
	Lugoj	Airbag cushions	Owned
	Resita	Airbag cushions	Owned
	Sfantu Georghe	Steering wheels	Owned
	Onesti	Steering wheels	Leased
	Rovinari	Seatbelts	Owned
Russia			
OOO Autoliv	Togliatti	Airbags, seatbelts and steering wheels	Leased
South Africa			
Autoliv Southern Africa (Pty) Ltd.	Krügersdorp	Seatbelts and airbags	Owned
South Korea			
Autoliv Corporation	Hwasung	Airbags	Owned
Spain			
Autoliv BKI S.A.U.	Valencia	Airbags	Owned
Sweden			
Autoliv Sverige AB	Vårgårda	Airbag inflators	Owned
Thailand			
Autoliv Thailand Ltd.	Chonburi	Seatbelts, Airbags and Steering wheels	Owned
	Chonburi	Seatbelt components	Leased
Tunisia			
STE ASW3 Nadour	El Fahs	Steering wheels	Owned & Leased
STE ASW3 Nadour	Nadhour	Steering wheels	Owned
Turkey			
Autoliv Cankor Otomotiv Emniyet Sistemleri Sanayi Ve Ticaret A.S.	Gebze-Kocaeli	Seatbelts	Owned
Autoliv Cankor Otomotiv Emniyet Sistemleri Sanayi Ve Ticaret A.S. Gebze-Subesi	Gebze-Kocaeli	Airbags, Steering wheels and Seatbelt components	Leased
United Kingdom			
Airbags International Ltd	Congleton	Airbag cushions	Owned
USA			
Autoliv ASP, Inc.	Brigham City	Airbag inflators	Owned
	Ogden	Airbags	Owned
	Ogden	Airbags and service parts	Leased
	Promontory	Propellant	Owned
	Tremonton	Airbag initiators and seatbelt micro gas generators	Owned

AUTOLIV TECHNICAL CENTERS AND CRASH TEST TRACKS

Country/Company	Location	Product(s) supported
China		
Autoliv (Shanghai) Vehicle Safety System Technical Center Co., Ltd.	Shanghai	Inflators and pyrotechnics customer applications, airbags, steering wheels and seatbelts customer applications and platform development with full-scale test laboratory
France		
Autoliv France SNC	Gournay-en-Bray	Airbags and seatbelts customer applications and platform development with full-scale test laboratory
Livbag SAS Autoliv Isodelta SAS	Pont-de-Buis Chiré-de-Montreuil	Inflator and pyrotechnic development Steering wheels development and customer applications
Germany		
Autoliv B.V. & Co. KG	Dachau	Customer applications and platform development, airbags with full-scale test laboratory
	Elmshorn	Seatbelts with full-scale test laboratory
India		
Autoliv India Private Ltd.	Bangalore	Airbags and seatbelts with sled testing
Japan		
Autoliv Japan Ltd.	Tsukuba	Airbags and seatbelts customer applications and platform development with sled test laboratory
Poland		
Autoliv Poland Sp. zo.o.	Jelcz	Airbags applications and platform development
Romania		
Autoliv Romania S.R.L.	Brasov	Seatbelts with sled test laboratory
South Korea		
Autoliv Corporation	Seoul	Airbags and seatbelts customer applications and platform development with sled test laboratory
Sweden		
Autoliv Development AB Autoliv Sverige AB	Vårgårda Vårgårda	Research center Airbags customer applications, inflator and special safety products development with full-scale test laboratory
USA		
Autoliv ASP, Inc.	Auburn Hills	Airbags, steering wheels, and seatbelts customer applications and platform development with sled test laboratory
	Ogden	Airbags, inflators and pyrotechnics customer applications and platform development

Item 3. Legal Proceedings

In the ordinary course of its business, the Company is subject to legal proceedings brought by or against the Company and its subsidiaries.

See Note 17, Contingent Liabilities, to the Consolidated Financial Statements in this Annual Report for a summary of certain ongoing legal proceedings. Such information is incorporated into this Part I, Item 3 – “Legal Proceedings” by reference.

Item 4. Mine Safety Disclosures

Not applicable.

PART II

Item 5. Market for Registrant's Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities

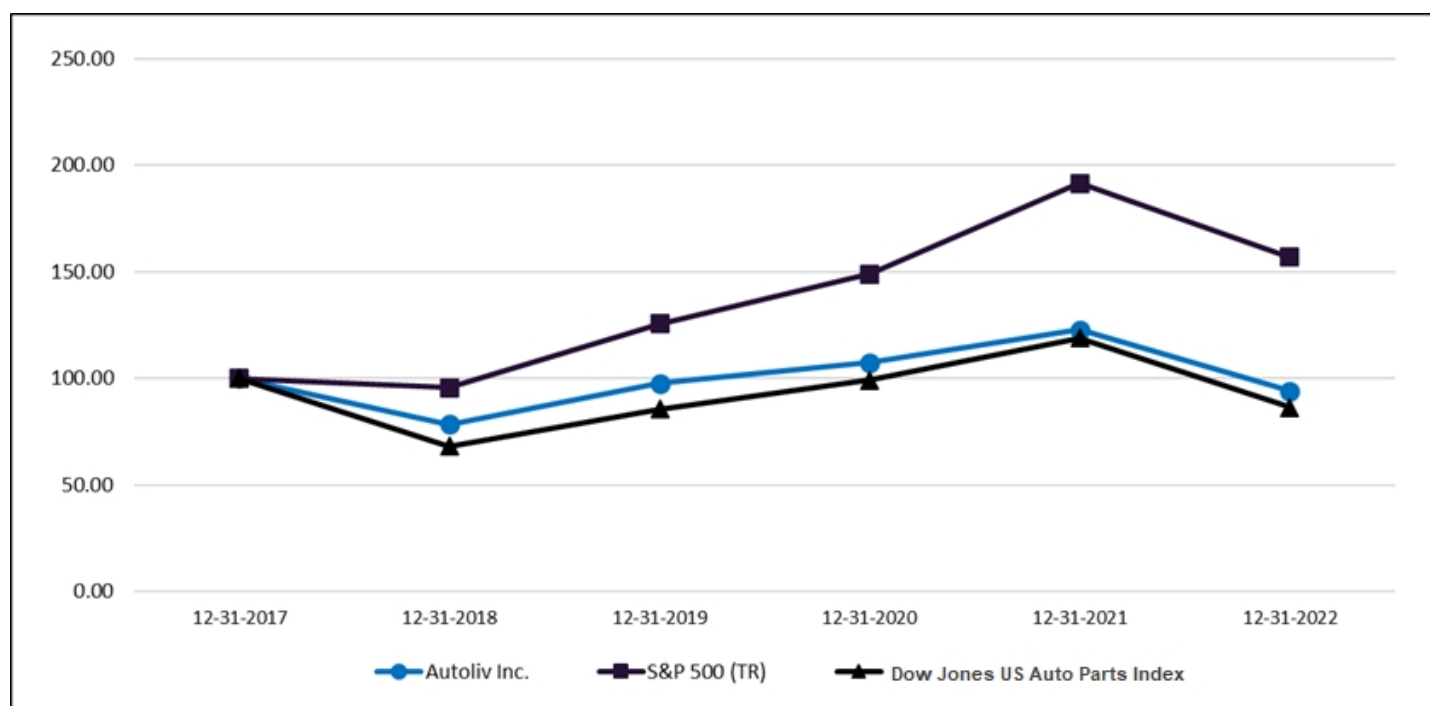
Shareholder information

The primary exchange market for Autoliv's securities is the New York Stock Exchange (NYSE) where Autoliv's common stock trades under the symbol "ALV". Autoliv's Swedish Depositary Receipts (SDRs) are traded on NASDAQ Stockholm's list for large market cap companies under the symbol "ALIV SDB". Options in SDRs trade on Nasdaq Stockholm under the name "Autoliv SDB". Options in Autoliv shares are traded on NASDAQ OMX PHLX and on NYSE Amex Options under the symbol "ALV".

Stock Performance Graph

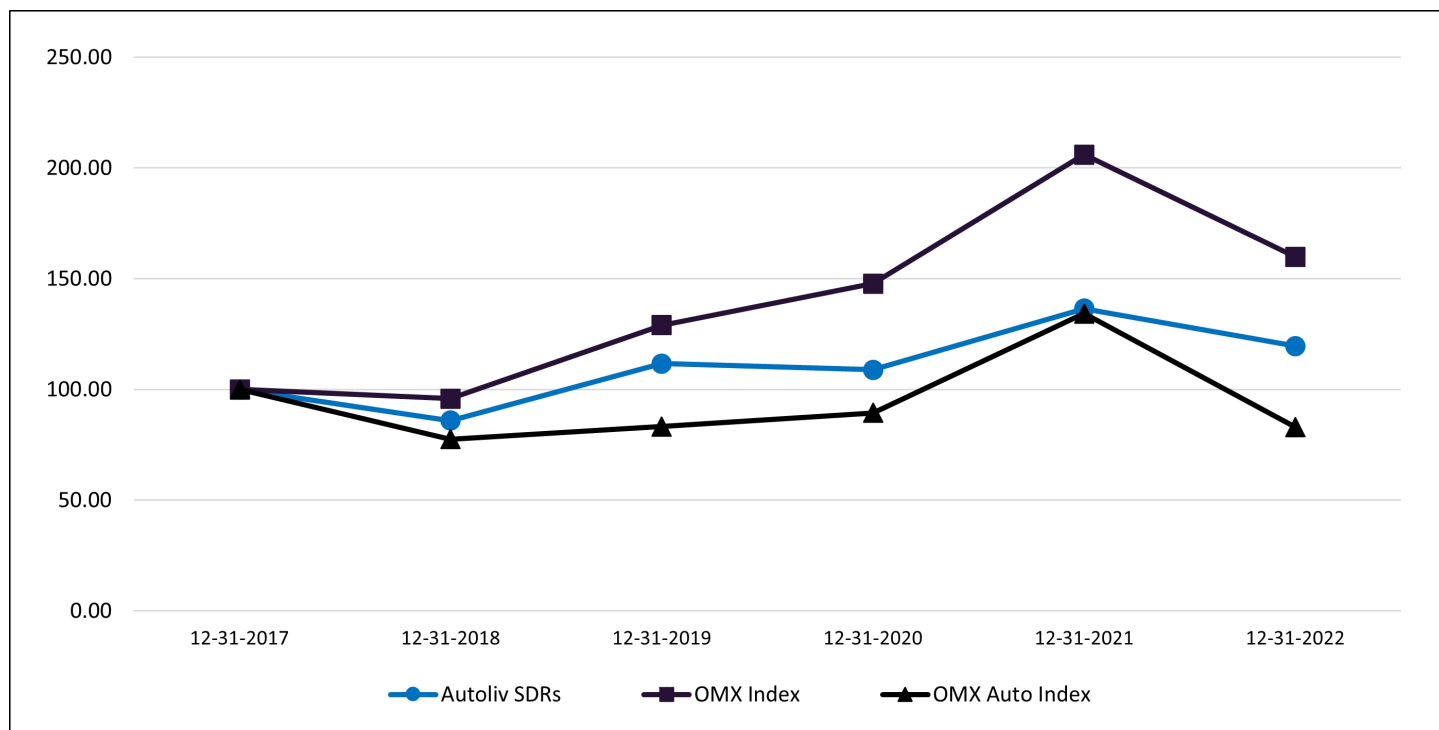
The graph and table below show the cumulative total shareholder return for our common stock since December 31, 2017. The graph compares our performance to that of the Standard & Poor's 500 Stock Index (S&P 500) and the Dow Jones US Auto Parts Index. The Dow Jones US Auto Parts Index is our newly chosen and replaces the OMX Auto Index we used in prior reports. We believe the Dow Jones US Auto Parts Index is a better representation of our peer companies than the OMX Auto Index which is composed of a smaller number of public Swedish companies.

The comparison assumes \$100 was invested at the closing price of our common stock on the NYSE on December 31, 2017. Each of the returns shown assumes that all dividends paid were reinvested.



	12-31-2017	12-31-2018	12-31-2019	12-31-2020	12-31-2021	12-31-2022
Autoliv, Inc.	\$ 100	\$ 78.45	\$ 97.57	\$ 107.32	\$ 122.89	\$ 94.13
SP500TR	100	95.62	125.72	148.85	191.58	156.88
Dow Jones US Auto Parts Index	100	68.30	85.56	99.27	118.94	86.35

The following graph and table below show the cumulative total shareholder return for our Swedish Depositary Receipts ("SDRs") since December 31, 2017. The graph compares our performance to that of the Nasdaq OMX All Share Index ("OMX Index") and the OMX Auto Component Index ("OMX Auto Index"). The comparison assumes 100 Swedish Kronor was invested at the closing price of our SDRs on the OMX on December 31, 2017. Each of the returns shown assumes that all dividends paid were reinvested. This graph and table will be discontinued in the future.



(SEK)	12-31-2017	12-31-2018	12-31-2019	12-31-2020	12-31-2021	12-31-2022
Autoliv SDRs	100	85.92	111.65	108.86	136.43	119.53
OMX Index	100	95.84	128.98	147.75	206.01	159.87
OMX Auto Index	100	77.52	83.18	89.35	134.26	82.92

Number of shares

As of December 31, 2022, the number of shares outstanding, net of treasury shares, was 86.2 million, compared to 87.5 million as of December 31, 2021.

During 2022, the weighted average number of shares outstanding (excluding dilution and treasury shares) decreased to 87.1 million from 87.5 million in 2021. Assuming dilution, the weighted average number of shares outstanding for the full year 2022 decreased to 87.2 million from 87.7 million in 2021.

Stock options (if exercised) and granted Restricted Stock Units (RSUs) and Performance Shares (PSs) could increase the number of shares outstanding as of December 31, 2022 by 0.3 million shares in the aggregate. Combined, this would add 0.4% to the number of shares outstanding as of December 31, 2022. In November 2021, the Board of Directors approved a new stock repurchase program that authorizes the Company to repurchase up to \$1.5 billion or up to 17 million shares (whichever comes first) between January 2022 and the end of 2024. On December 15, 2022, the Board of Directors approved the retirement of 10.0 million treasury shares. On December 31, 2022, the Company had 5.0 million treasury shares.

Shareholders

Of the shares held by institutional investors, Autoliv estimates that around 47% were held by Sweden-based shareholders, around 31% by US-based shareholders and around 9% by UK-based shareholders. Most of the remaining Autoliv shares were held in Switzerland, Norway, Germany and France.

Dividends

Autoliv has a history of paying quarterly cash dividends. Declared dividends are announced in press releases and published on Autoliv's corporate website. The Board of Directors revisits dividends on a quarterly basis. There can be no assurance that the Board of Directors will declare dividends in the future. See Autoliv's corporate website for additional details regarding historical dividends.

Stock incentive plan

Autoliv employees participate in the Autoliv, Inc. 1997 Stock Incentive Plan, as amended (the "Stock Incentive Plan") and receive Autoliv stock-based awards from time to time. Additional information regarding the securities authorized for issuance under the Stock Incentive Plan is included in Item 12 of this Annual Report.

Autoliv has adopted a Stock Ownership Policy for Executives requiring the Company's Chief Executive Officer (CEO) to accumulate and hold the number of Autoliv shares having a value of twice his annual base salary. For other executives, the minimum requirement is, over time, a holding equal to each executive's annual base salary.

Stock repurchase program

The following table provides information with respect to common stock repurchases by the Company during the three months period ended December 31, 2022.

Period	New York Stock Exchange (NYSE)		Total Number of Shares Purchased as Part of Publicly Announced Plans or Programs (3)	Maximum Number of Shares that May Yet Be Purchased Under the Plans or Programs (3)
	Total Number of Shares Purchased (1)	Average Price Paid per Share (USD) (2)		
October 1-31, 2022	249,090	\$ 80.31	1,039,981	15,960,019
November 1-30, 2022	400,591	\$ 87.38	1,440,572	15,559,428
December 1-31, 2022	—	\$ —	1,440,572	15,559,428

(1) The repurchases are being executed from time to time, subject to general business and market conditions and other investment opportunities, through open market purchases or privately negotiated transactions, including through Rule 10b5-1 plans. For accounting purposes, shares repurchased under our stock repurchase programs are recorded based upon the settlement date of the applicable trade.

(2) Average price paid per share includes costs associated with the repurchases.

(3) On November 16, 2021, the Company announced that its Board of Directors approved a new stock repurchase program that authorizes the Company to repurchase up to \$1.5 billion or up to 17 million common shares, whichever comes first, between January 2022 and the end of 2024.

Item 6. [RESERVED]

Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations

IMPORTANT TRENDS

The discussions and analysis in this section are focused on the Company's results of operations for the year ended December 31, 2022 compared to the year ended December 31, 2021. Discussions of the Company's results of operations for the year ended December 31, 2021 compared to the year ended December 31, 2020 can be found in Part II, Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations in the Company's Form 10-K for the year ended December 31, 2021, which was filed with the United States Securities and Exchange Commission on February 22, 2022.

Autoliv, Inc. (the "Company") provides automotive safety systems to the automotive industry with a broad range of product offerings, primarily passive safety systems. In the year ended December 31, 2022, a number of factors influenced the Company's results of operations, including:

- Industry supply chain disruptions and the global semiconductor shortage limited the light vehicle production (LVP) recovery and caused high customer call-off volatility
- Raw material price increases and corresponding inflation compensation negotiations with customers
- COVID-19 pandemic
- Continued growth above LVP driven by price, higher content per vehicle, and execution of strong order book
- Order intake adding to an already strong customer base
- Strategic and structural initiatives
- Continued focus on operational excellence and quality

YEARS ENDED DEC. 31 (DOLLARS IN MILLIONS, EXCEPT EPS)	2022		2021	
	Reported ¹⁾	change	Reported ¹⁾	change
Global light vehicle production (in thousands)	79,289	6.9 %	74,136	3.6 %
Consolidated net sales	\$ 8,842	7.4 %	\$ 8,230	11 %
Operating income	659	(2.3) %	675	77 %
Operating margin, %	7.5	(0.7) pp	8.2	3.1 pp
Net income attributable to controlling interest	423	(2.8) %	435	133 %
Earnings per share ²⁾	4.85	(2.2) %	4.96	132 %
Net cash provided by operating activities	713	(5.4) %	754	(11) %
Return on capital employed, %	17.5	(0.7) pp	18.3	7.9 pp

1) Reported figures impacted by costs for capacity alignments and antitrust related matters. See section Items affecting comparability and Note 11 to the Consolidated Financial Statements included herein.

2) Assuming dilution and net of treasury shares.

SUPPLY CHAIN

LVP in 2022 was limited by the global semiconductor shortage and other industry supply chain disruptions. 2022 saw global LVP growth year-over-year by around 6.9% (according to S&P Global January 2023). Supply chain disruptions led to low customer demand visibility and material changes to customer call-offs with short notice which negatively impacted our production efficiency and profitability in 2022. Rising raw material costs amounted to around 4.5pp in operating margin headwind in 2022, which to a large extent was offset by commercial customer recoveries.

The Company expects the current industry-wide supply chain disruptions to be a limiting factor for the global LVP in the first half year of 2023, while the Company expects that demand and supply will be in better balance in the second half of 2023.

COVID-19

Direct COVID-19 related costs, such as personal protective equipment, quarantine costs and similar items, were around \$15 million in 2022. Governmental support in connection with furloughing, short-term work weeks, and other similar activities were around \$8 million in 2022.

INFLATION

The Company expects the raw material price changes in 2023 will to a large extent be reflected in price changes in the Company's products, albeit with delays of several months. The Company also expects significant cost pressure from broad based inflation relating to labor, logistics, utilities and other items. The Company continues to execute on productivity and cost reduction activities to offset this inflation, and the Company has also initiated challenging discussions with its customers on non-raw material cost inflation. The Company believes price adjustments will gradually offset the non-raw material cost inflation as the market digests these new realities, with limited positive effects in the first quarter and gradual improvement as the year progresses.

THE WAR IN UKRAINE

The direct impact of the war in Ukraine on our business has been relatively limited. In 2021, sales in Russia were less than 1.0% of the Company's total sales, declining to less than 0.1% in 2022. Autoliv has one facility with fewer than 20 employees in Russia, down from close to 200 employees before the start of the war. Our operations in Russia are currently suspended. Autoliv net assets in Russia consists of USD cash items, which amount to around \$8 million. Autoliv has no operations in Ukraine.

GROWTH IMPACTED BY LIGHT VEHICLE PRODUCTION, SAFETY CONTENT PER VEHICLE, AND STRONG ORDER BOOK

The most important driver for Autoliv's sales is the LVP. During the past ten years, LVP has shown year-over-year growth with the exception of the years 2018-2020. Despite strong end-consumer demand for new vehicles, global LVP only grew by 6.9% in 2022 - much below the 8.9% expected by S&P Global in the beginning of the year. For Europe, the LVP growth of 18% that was expected in the beginning of the year became a decline of 1%. This was mainly a result of distressed global automotive supply chains and limited semiconductor availability impacted by the COVID-19 pandemic.

During 2022, the Company experienced a limited improvement in global LVP in the second half of the year, compared to a relatively weaker first half of the year, indicating a somewhat improved availability of semiconductors and stability of global automotive supply chains in the second half of the year.

Light Vehicle Production¹⁾

	2022		2021		Change 2022 vs 2021	
	(000') units	% global	(000') units	% global	(000') units	%
Americas	15,879	20%	14,518	20%	1,361	9%
<i>North America</i>	13,078	16%	11,933	16%	1,145	10%
<i>South America</i>	2,801	4%	2,585	3%	216	8%
Europe	15,561	20%	15,765	21%	(204)	(1)%
Asia	45,638	58%	41,840	56%	3,798	9%
<i>China</i>	25,229	32%	23,290	31%	1,939	8%
<i>Japan</i>	7,290	9%	7,307	10%	(17)	(0)%
<i>South Korea</i>	3,695	5%	3,407	5%	288	8%
<i>India</i>	5,078	6%	4,139	6%	939	23%
<i>Other Asia</i>	4,345	5%	3,698	5%	647	17%
Other	2,210	2%	2,013	3%	197	10%
Global Total	79,289		74,136		5,153	7%

¹⁾ Source: S&P Global

Chinese LVP, the world's largest automotive market, increased by 2.0 million units or by 8% from 2021 to 2022. In Europe, an important market for automotive safety systems, LVP decreased by 1% or by approximately 0.2 million light vehicles during the same period. In North America, LVP increased by 1.1 million units, or by 10% compared to 2021.

During 2022, Europe's share of global LVP has declined to 20% from 21% while Americas' share was unchanged at 20% and China's share increased to 32%. Japan's share declined to 9% from 10% while India's share remained at 6%.

Despite macro-economic uncertainties in parts of the world, we expect light vehicle markets to grow both in the short and long term, driven by pent-up end user demand and a rebuilding of new vehicle inventories. The growth is expected to take place in all regions.

Due to more stringent crash test rating requirements, by institutes such as Euro NCAP, increased government regulations and increasing consumer demand for more safety in emerging markets, the Company sees vehicle manufacturers installing more airbags and more advanced seatbelt systems in vehicles. This generally takes place when new models are introduced. The safety standards of vehicles are increasing in China, India, and other growth markets such as Brazil, partially due to new government regulations and crash test rating programs. For example, the Indian government has decided on a new traffic regulation that mandates more rigid crash test standards for light vehicles. This is supporting higher installation rates of airbags and more advanced seatbelts, impacting CPV positively. Commercial customer recoveries compensating for increased raw material costs also added to CPV in 2022, partly offset by negative effects from continued productivity related pricing pressure from vehicle manufacturers. The trend of increasing CPV was negatively impacted in 2022 by the unfavorable regional LVP mix development, as more than 75% of global LVP growth came from lower safety content regions such as China, India, Other Asia, and South America. This negative regional mix effect was more than offset by the overall increase in global CPV of more than 6% and the execution of the Company's strong order book, which supported an organic growth (see section Non-U.S. GAAP Performance Measures) of 6.6 percentage points above growth in global LVP. The average global safety CPV (airbags, pedestrian safety, seatbelts, and steering wheels) amounted to around \$255 in 2022.

The more stringent crash rating requirements and consumer demand for more safety should enable the global automotive safety market to grow around 2-3 percentage points per year faster than the global LVP during the next two years. This excludes the impact from cost inflation related price increases.

The past years' high order intake share has resulted in the Company's sales development outperforming the underlying LVP significantly in the past three years. In 2022, the Company's organic sales development outpaced global LVP by around 6.6 percentage points, due to increased safety content per vehicle and as an effect of recent years high order intake share.

The Company estimates that the sales to Electric Vehicles (not including PHEVs) amounted to more than \$1 billion in 2022, decreasing our dependency on ICE vehicles.

WELL BALANCED GLOBAL FOOTPRINT

The Company's regional sales mix continues to be balanced with 27% of sales in Europe, 33% in the Americas and 40% in Asia in 2022, compared to 28%, 31% and 41%, respectively, in 2021. In Asia, the Company's sales in the important Chinese market remained at 21% of total sales in 2022. The Company's sales in India increased to 4% of total sales in 2022 from 3% in 2021.

The balanced regional sales mix has been achieved through timely investments and strengthening of technical and support capabilities in growth markets.

ORDER INTAKE ADDING TO AN ALREADY STRONG CUSTOMER BASE

The Company's order intake in 2022, with high win rates for new EV platforms with both new and traditional OEMs, added to the Company's already strong base, which includes supplying products to more than 1,300 vehicle models and around 100 car brands. The order intake in 2022 supports the Company's estimate that the Company's sales market share is moving towards around 45% in the next few years. The Company estimates that its sales market share was unchanged at around 43% in 2022. The lead time from order intake to start of production is typically 1-3 years. During this period the products are engineered into the vehicle to provide the expected protection for occupants in case of a crash and to meet legal and regulatory requirements, as well as other requirements from the vehicle manufacturer. This investment in new products is the main reason for the high level of RD&E expenses, net. Additionally, the Company has to build up production capacity, in the form of new lines, to meet future product launches.

The Company's order intake share for 2022 continued on a high level. The estimated life-time sales for all orders booked in 2022 is around \$10.7 billion, almost unchanged compared to around \$10.8 billion in 2021, despite currency headwinds and lower LVP outlook in 2022. The 2022 order intake included high win rates with relatively new automakers and for new EV platforms. New order intake is defined as the sales value of awards for future business, received within that year. The life time value is calculated using detailed assumptions of price and volumes over the years of production and the exchange rates prevailing at the time of receiving the order.

Our sales growth has outperformed the change in global LVP by around 5-7 percentage points every year in the past five years. In 2022, the outperformance was 6.6 percentage points. During 2022, growth was positively affected through recent launches of several new models, including GMC Sierra/Chevrolet Silverado, Toyota Tundra, and Toyota Yaris as well as steering wheels sales to a number of Mercedes models.

STRATEGIC INITIATIVES AND STRUCTURAL IMPROVEMENTS

2022 light vehicle market was hampered by an industry wide shortage of semi-conductors, a distressed global automotive supply chain and a raw material inflation which resulted in significant increases in cost for purchased material. In response, Autoliv management continued to implement strict cost control measures, including footprint and capacity alignments in Europe, Japan, South Korea as well as moving overhead functions to Best Cost Countries.

Additionally, the Company has introduced several initiatives in previous years, such as the Structural Efficiency Program 1 and 2. The first program was fully implemented in 2020 and the second program was fully implemented by 2022.

The provision, net of reversals, for restructuring activities in 2022 amounted to \$13 million compared to \$8 million in 2021. As of December 31, 2022, the Company had \$31 million reserved in its balance sheet related to restructuring compared to \$88 million last year. For more information, see Note 11, Restructuring, to the Consolidated Financial Statements included herein.

In addition to the structural improvements outlined above, the Company continues to implement the strategic initiatives to improve the efficiency of its value chain from end to end, not least through the Autoliv Production System and increased digitalization and automation. With several hundred projects in implementation or undergoing development, the Company has a high pace in the planning and implementation of the strategic initiatives and structural improvements. These initiatives are key drivers to the Company's medium-term targets and building the foundation to continue to create shareholder value.

IMPROVED EFFICIENCIES THROUGH OPERATIONAL EXCELLENCE

Pricing pressure is an inherent part of the automotive supplier business. Price reductions are generally higher on newer products with strong volume growth compared to older products, where both the possibilities to re-design the product to reduce costs and market growth are less. Price reductions can also depend on the business cycle and raw material price development. For the five-year period 2017-2021, the Company estimates the average reduction of product prices on existing programs to have been in the range of around 2-4% annually. In 2022, the pricing environment changed to some extent due to high raw material price and cost increases, which led to renegotiations with customers regarding commercial terms. These discussions resulted in a net positive price development, gradually implemented throughout the year.

A key strategy for Autoliv to be and to remain cost competitive is to reduce labor costs, through continuously implementing productivity improvement programs, optimizing the Company's production footprint, and instituting restructuring and capacity alignment activities as well as other actions to address the Company's cost structure.

The Company's productivity improvement target is to achieve at least 5% savings per year. To meet this target, Autoliv has developed a set of strategies to reduce costs in manufacturing:

- Autoliv production system (APS) is based on lean manufacturing methodology which aims to continuously increase output with less resources. APS provides the target conditions and tools to achieve the delivery of goods and services at the right time, in the right amount, at the required quality and at the lowest cost possible to all the Company's customers.
- Autoliv One Product One Process (1P1P) strategy focuses on product and process standardization and reducing cost and complexity. The 1P1P strategy, combined with initiatives to reduce costs for components from external suppliers, ensures that the Company continuously optimize its supply base footprint, consolidate purchase volumes to fewer suppliers, improve productivity in the Company's supply chain, standardize components and redesign its products.
- Strategic Initiatives, including Automation, Digitalization, Supply Chain Management Effectiveness and RD&E Effectiveness.

The Company's historic experience is that the continuous improvement strategies have enabled productivity improvement at or above its target of 5%. However, this was not the case in the past three years due to the COVID-19 pandemic related decline in LVP in 2020 and the high volatility in customer call-offs in 2021 and 2022 driven by the industry wide supply chain instability, especially for semiconductors.

The Company foresees opportunities for further productivity on gains from LVP recovery and increased call-off stability when supply of semiconductors eventually improves, but also from increasing use of automation in its assembly for lean manufacturing processes. Additionally, automated cells typically perform the manufacturing process with reduced variability. This results in greater control and consistency of product quality.

FOCUS ON QUALITY

The number of vehicle recalls in the automotive industry continues on a relatively high level. The Company expects overall recall numbers to remain high for years to come and, although the Company strives for the highest quality in its processes, it cannot be ruled out that the Company may also be adversely impacted by a future recall.

Quality has been and always will be the Company's number one priority, and the Company continues to sharpen its focus in this area. The Company now holds a global market share in passive safety of around 43%, while the Company has been involved in less than 2% of recalls in the industry in the past ten years. This indicates that the Company is delivering on its quality strategy. For more information see product warranty and recalls in Note 12, Product Related Liabilities, to the Consolidated Financial Statements in this Annual Report.

CHANGES IN COMPETITIVE LANDSCAPE

During the past eight years, Autoliv experienced significant changes in its competitive landscape. In 2015, TRW, a key competitor in passive safety, was acquired by German group ZF Friedrichshafen. In 2016, Key Safety Systems ("KSS") was acquired by Ningbo Joyson Electronic Corp. Beginning in 2014, Takata, Autoliv's largest competitor at the time, experienced severe issues and recalls related to malfunctioning airbag inflators, leading the company to file for bankruptcy protection in the U.S. and Japan. In 2018, Joyson substantially acquired all of Takata's global assets and operations and combined it with KSS, forming the new company JSS.

CAPITAL STRUCTURE

The Company's net debt stood at \$1,184 million on December 31, 2022. This was an increase of \$132 million compared to December 31, 2021. Total interest-bearing debt at December 31, 2022 amounted to \$1,766 million, a decrease of \$242 million compared to December 31, 2021.

Cash flow from operations was \$713 million in 2022 and \$754 million in 2021. Capital expenditures, net amounted to \$485 million in 2022 and \$454 million in 2021. During 2022 and 2021 the Company paid dividends of \$224 million and \$165 million, respectively.

It is the Company's policy to maintain a financial leverage commensurate with a "strong investment grade credit rating". The long-term target is to have a leverage ratio (see section Non-U.S. GAAP Performance Measures) of around 1.0x and to be within the range of 0.5x to 1.5x. At December 31, 2022, the current leverage ratio is 1.4x. The Company monitors its capital structure and the financial markets closely and intends to maintain a high level of financial flexibility while being shareholder friendly.

As part of the adjustment of the capital structure, the Company historically has repurchased shares of its common stock. During 2022, the Company repurchased and retired 1.44 million shares, under the stock repurchase program authorized by the Board of Directors in November 2021. This stock repurchase program authorizes the Company to repurchase up to \$1.5 billion or up to 17 million shares (whichever comes first) between January 2022 and the end of 2024. In addition, in 2022, the Company retired 10 million shares of common stock that has been held in treasury. These shares were acquired between 2008 and 2014 under the prior stock repurchase program. After the retirement, the Company continues to hold around 5 million shares of common stock in treasury.

OUTLOOK FOR 2023

The Company's outlook indications for 2023 are mainly based on our customer call-offs, a full year 2023 global LVP growth of around 3%, that we achieve our targeted cost compensation effects and that customer call-off volatility is reduced.

Financial measure	Full year indication
Organic sales growth	Around 15%
Foreign exchange impact on net sales	Around 1% negative
Adjusted operating margin ¹⁾	Around 8.5-9%
Tax rate ²⁾	Around 32%
Operating cash flow ³⁾	Around \$900 million
Capital expenditures, net % of sales	Around 6%

1) Excluding costs for capacity alignments, anti-trust related matters and other discrete items.

2) Excluding unusual tax items.

3) Excluding unusual items.

The forward-looking non-U.S. GAAP financial measures above are provided on a non-U.S. GAAP basis. Autoliv has not provided a U.S. GAAP reconciliation of these measures because items that impact these measures, such as costs related to capacity alignments and antitrust matters, cannot be reasonably predicted or determined. As a result, such reconciliation is not available without unreasonable efforts and Autoliv is unable to determine the probable significance of the unavailable information.

SIGNIFICANT LEGAL MATTERS

See Item 3. Legal Proceedings and Note 17 Contingent Liabilities to the Consolidated Financial Statements in this Annual Report.

RESULTS OF OPERATIONS

Consolidated net sales in 2022 increased by 7.4% compared to 2021. Excluding negative currency translation effects of 6.1%, the organic sales increased (Non-U.S. GAAP measure, see reconciliation table below) by 14.0%.

Sales by Product

	2022	2021	Reported change	Components of Change in Net Sales	
				Currency effects ¹⁾	Organic
Airbags, Steering Wheels and Other ²⁾	\$ 5,807	\$ 5,380	7.9%	(5.9)%	14.0%
Seatbelt products ²⁾	3,035	2,850	6.5%	(6.4)%	13.0%
Total	\$ 8,842	\$ 8,230	7.4%	(6.1)%	14.0%

1) Effects from currency translations.

2) Including Corporate and Other sales.

The largest contributor to the organic growth within Airbags, Steering Wheels and Other were inflatable curtains and steering wheels, followed by passenger airbags and side airbags.

The main contributors to the organic growth were Europe and Americas, followed by Asia excluding China, and China.

Sales by Region

	2022	2021	Reported change	Components of Change in Net Sales	
				Currency effects ¹⁾	Organic
Asia	\$ 3,521	\$ 3,407	3.3%	(7.9)%	11%
Whereof: China	1,883	1,766	6.6%	(4.4)%	11%
Japan	686	733	(6.4)%	(16)%	9.2%
Rest of Asia	952	908	4.8%	(8.6)%	13%
Americas	2,967	2,535	17%	0.5%	17%
Europe	2,355	2,289	2.9%	(11)%	13%
Global	\$ 8,842	\$ 8,230	7.4%	(6.1)%	14%

1) Effects from currency translations.

Autoliv's global sales increased organically (Non-U.S. GAAP measure, see reconciliation table above) by 14.0% compared to 2021, which was 6.6 percentage points better than global LVP (according to S&P Global, January 2023). Sales increased organically in all regions. The 6.6pp outperformance was driven by price increases and new product launches, partly offset by negative geographical mix effects. Autoliv outperformed LVP by around 15pp in Europe, by around 9pp in Japan, by around 7pp in Americas and by around 3pp in China, while we underperformed LVP by around 3pp in rest of Asia.

2022 Organic growth ¹⁾	Americas	Europe	China	Japan	Rest of Asia	Global
Autoliv	17%	13%	11%	9.2%	13%	14%
Main growth drivers	GM, Ford, Stellantis	VW, Stellantis, Toyota	Toyota, Geely, BYD	Subaru, Mitsubishi, Nissan	Tata, Suzuki, Hyundai	Stellantis, Toyota, Ford
Main decline drivers	Nissan	Nissan, Mitsubishi, Volvo	Great Wall, Hyundai, Mazda	n/a	Nissan, Mitsubishi	Great Wall, Nissan

¹⁾ Non-U.S. GAAP Measure

Condensed Statement of Income

(Dollars in millions, except per share data)	Years ended December 31		Change
	2022	2021	
Net Sales	\$ 8,842	\$ 8,230	7.4%
Gross profit	1,396	1,511	(7.6)%
% of sales	15.8%	18.4%	(2.6)pp
S,G&A	(437)	(432)	1.2%
% of sales	(4.9)%	(5.2)%	0.3pp
R,D&E net	(390)	(391)	(0.1)%
% of sales	(4.4)%	(4.7)%	0.3pp
Other income (expense), net	93	(3)	n/a
Operating income	659	675	(2.3)%
% of sales	7.5%	8.2%	(0.7)pp
Adjusted operating income ³⁾	598	683	(12)%
% of sales	6.8%	8.3%	(1.5)pp
Financial and non-operating items, net	(56)	(61)	(7.9)%
Income before taxes	603	614	(1.8)%
Tax rate	29.5%	28.9%	0.7pp
Net income	425	437	(2.7)%
Earnings per share, diluted ^{1, 2)}	4.85	4.96	(2.2)%
Adjusted earnings per share, diluted ^{1, 2), 3)}	4.40	5.02	(12)%

¹⁾ Assuming dilution and net of treasury shares.

²⁾ Participating share awards with right to receive dividend equivalents are (under the two-class method) excluded from the EPS calculation.

³⁾ Non-U.S. GAAP Measure.

Gross Profit

In 2022, Gross profit decreased by \$115 million and the gross margin decreased by 2.6 pp compared to 2021. The gross profit decrease was primarily driven by adverse effects from higher costs for raw material and premium freight and adverse currency translation effects, partly offset by price increases.

Operating Income

Operating income decreased in 2022 by \$16 million, mainly as a consequence of lower gross profit, partly offset by improved Other income (expense).

Selling, General and Administrative (S,G&A) expenses increased in 2022 by \$5 million, or by 1.2%, mainly relating to investments in personnel and IT and improvement projects, partly offset by positive currency translation effects.

Research, Development & Engineering (R,D&E) expenses, net decreased in 2022 by \$1 million, or by 0.1%. In relation to sales, R,D&E costs declined from 4.7% to 4.4%.

Other income (expense), net decreased by \$96 million in 2022 compared to the previous year, mainly due to around \$80 million gain from the sale of a property in Japan and around \$20 million from a patent litigation settlement partly offset by around \$10 million in capacity alignment provision for the closure of a plant in South Korea.

Financial and Non-operating Items, net

Financial and non-operating items, net, costs increased by \$5 million in 2022 compared to previous year, mainly due to lower interest net and improved other non-operating items, net.

Income Taxes

The tax rate for 2022 was 29.5%, compared to 28.9% in 2021, mainly due to unfavorable country mix. In addition, discrete tax items, net, decreased the tax rate this year by 2.5pp. Discrete tax items, net increased the tax rate last year by 0.6pp.

Net Income and Earnings Per Share

Net income in 2022 decreased by \$12 million compared to 2021.

Earnings per share, diluted decreased by \$0.11 compared to a year earlier, where the main driver was \$0.19 from lower operating income, partly mitigated by \$0.04 from financial items.

The weighted average number of shares outstanding assuming dilution in 2022 was 87.2 million compared to 87.7 million in 2021.

NON-U.S. GAAP PERFORMANCE MEASURES

In this annual report, the Company sometimes refers to non-U.S. GAAP measures that the Company and securities analysts use in measuring Autoliv's performance.

The Company believes that these measures assist management and investors in analyzing trends in the Company's business for the reasons given below. Investors should not consider these non-U.S. GAAP measures as substitutes for, but rather as additions to, financial reporting measures prepared in accordance with U.S. GAAP.

These non-U.S. GAAP measures have been identified, as applicable, in each section of this annual report with tabular presentations provided below, reconciling them to U.S. GAAP.

It should be noted that these measures, as defined, may not be comparable to similarly titled measures used by other companies.

Organic Sales

The Company analyzes its sales trends and performance as changes in "organic sales growth" or "organic sales decline", because the Company currently generates approximately three quarters of net sales in currencies other than the reporting currency (i.e. U.S. dollars) and currency rates have proven to be rather volatile. Organic sales present the increase or decrease in the overall U.S. dollar net sales on a comparable basis, allowing separate discussions of the impact of acquisitions/divestitures and exchange rates.

See tabular reconciliations above, that present changes in "organic sales growth" as reconciled to the change in total U.S. GAAP net sales.

Trade working capital

Due to the need to optimize cash generation to create value for the Company's shareholders, management focuses on operationally derived trade working capital as defined in the table below.

The reconciling items used to derive this measure are, by contrast, managed as part of the Company's overall management of cash and debt, but they are not part of the responsibilities of day-to-day operations management.

Reconciliation of U.S. GAAP measure to "Trade working capital" (dollars in millions)

DECEMBER 31	2022	2021
Receivables, net	\$ 1,907	\$ 1,699
Inventories, net	969	777
Accounts payable	(1,693)	(1,144)
Trade working capital	\$ 1,183	\$ 1,332

Net debt

As part of efficiently managing the Company's overall cost of funds, the Company routinely enter into "debt-related derivatives" (DRD) as part of its debt management.

Creditors and credit rating agencies use net debt adjusted for DRD in their analyses of the Company's debt and therefore the Company provides this non-U.S. GAAP measure. See reconciliation table below. DRD are fair value adjustments to the carrying value of the underlying debt. Also included in the DRD is the unamortized fair value adjustment related to discontinued fair value hedges, which will be amortized over the remaining life of the debt. By adjusting for DRD, the total financial liability of net debt is disclosed without grossing debt up with currency or interest fair values.

Reconciliation of U.S. GAAP measure to "Net debt" (dollars in millions)

DECEMBER 31	2022	2021
Short-term debt	\$ 711	\$ 346
Long-term debt	1,054	1,662
Total debt	1,766	2,008
Cash and cash equivalents	(594)	(969)
Debt issuance cost/Debt-related derivatives, net	12	13
Net debt	\$ 1,184	\$ 1,052

Adjusted operating income, adjusted operating margin and adjusted EPS

Adjusted operating margin and adjusted EPS are non-U.S. GAAP measures the Company uses to evaluate its business, because the Company believes it assists investors and analysts in comparing the Company's performance across reporting periods on a consistent basis by excluding items that are non-operational or non-recurring in nature (such as costs related to capacity alignments, costs related to antitrust matters and for EPS unusual tax items) and that the Company does not believe are indicative of its core operating performance and underlying business trends. Adjusted operating margin and adjusted EPS, as shown in the table below, should be considered in addition to, but not as a substitute for, other measures of financial performance reported in accordance with U.S. GAAP, including operating margin and EPS.

Items affecting comparability

(DOLLARS IN MILLIONS, EXCEPT EPS)	2022			2021		
	Reported	Adjustments ¹⁾	Non-U.S. GAAP	Reported	Adjustments ¹⁾	Non-U.S. GAAP
Operating income	\$ 659	\$ (61)	\$ 598	\$ 675	\$ 8	\$ 683
Operating margin, %	7.5	(0.7)	6.8	8.2	0.1	8.3
Income before income taxes	603	(61)	542	614	8	622
Net income attributable to controlling interest	423	(39)	384	435	5	440
Capital employed	3,810	(39)	3,771	3,700	5	3,705
Return on capital employed, % ²⁾	17.5	(1.5)	16.0	18.3	0.2	18.5
Return on total equity, % ³⁾	16.3	(1.3)	15.0	17.1	0.2	17.3
Earnings per share, diluted ^{4, 5)}	\$ 4.85	\$ (0.45)	\$ 4.40	\$ 4.96	\$ 0.06	\$ 5.02

1) Represents costs for capacity alignments and antitrust related matters. See table below for a disaggregation of these costs.

2) Operating income and income from equity method investments, relative to average capital employed.

3) Net Income relative to average total equity for the year.

4) Assuming dilution and net of treasury shares.

5) Participating share awards with right to receive dividend equivalents are (under the two-class method) excluded from the EPS calculation.

Items included in Non-U.S. GAAP adjustments

	2022		2021	
	Adjustment Millions	Adjustment Per share	Adjustment Millions	Adjustment Per share
Capacity alignment	\$ (61)	\$ (0.70)	\$ 8	\$ 0.10
Total adjustments to Operating income	(61)	(0.70)	8	0.10
Tax on Non-U.S. GAAP adjustments ¹⁾	22	0.25	(3)	(0.04)
Total adjustments to Net Income	\$ (39)	\$ (0.45)	\$ 5	\$ 0.06
Weighted average number of shares outstanding - diluted ²⁾		87.2		87.7
Adjustment Return on capital employed	\$ (61)		\$ 8	
Adjustment Return on capital employed, %	(1.5)		0.2	
Adjustment Return on total equity	\$ (39)		\$ 5	
Adjustment Return on total equity, %	(1.3)		0.2	

1) The tax is calculated based on the tax laws in the respective jurisdiction(s) of the adjustment(s).

2) Annualized average number of outstanding shares.

LIQUIDITY, CAPITAL RESOURCES, AND FINANCIAL POSITION

(DOLLARS IN MILLIONS)	Years ended December 31	
	2022	2021
Net cash provided by operating activities	\$ 713	\$ 754
Net cash used in investing activities	(485)	(454)
Net cash used in financing activities	(531)	(469)
Effect of exchange rate changes on cash and cash equivalents	(73)	(39)
Decrease in cash and cash equivalents	(375)	(209)
Cash and cash equivalents at beginning of year	969	1,178
Cash and cash equivalents at end of year	\$ 594	\$ 969

NET CASH PROVIDED BY OPERATING ACTIVITIES

Cash flow from operations, together with available financial resources and credit facilities, are expected to be sufficient to fund the Company's anticipated working capital requirements, capital expenditures and future dividend payments.

Net cash provided by operating activities was \$713 million in 2022 compared to \$754 million in 2021. The decrease of \$41 million was mainly due to lower net income excluding the gain on property divestiture, lower depreciation and amortization and adverse effects from changes in deferred income taxes partly offset by positive working capital effects.

At December 31, 2022, trade working capital (see section Non-U.S. GAAP Performance Measures above) amounted to \$1,183 million corresponding to 13% of net sales compared to \$1,332 million and 16% at December 31, 2021.

Receivables outstanding in relation to sales (see Glossary and Definitions for definition) were 20% at December 31, 2022, compared to 20% at December 31, 2021. Factoring agreements did not have any material impact on receivables outstanding for 2022 or 2021.

Inventory in relation to sales (see Glossary and Definitions for definition) was 10% at December 31, 2022, compared to 9% at December 31, 2021.

Payables outstanding in relation to sales (see Glossary and Definitions for definition) were 18% at December 31, 2022 compared to 14% at December 31, 2021.

NET CASH USED IN INVESTING ACTIVITIES

In 2022 and 2021, net cash used in investing activities amounted to \$485 million and \$454 million, respectively. The Company's investing activities primarily consist of investments in property, plant and equipment. Net cash generated by operating activities continued to sufficiently cover capital expenditures for property, plant and equipment.

The net increase of \$31 million compared to previous year was mainly due to increased investments of \$126 million, mainly related to footprint and capacity expansions, partly offset by \$95 million in proceeds from the sale of property in Japan. In relation to net sales, capital expenditures, net was unchanged at 5.5%.

Depreciation and amortization totaled \$363 million in 2022 compared to \$394 million in 2021.

During the years 2022 and 2021, a majority of the Company's investments were for production capacity to support new product launches and automation projects for improved efficiency. Major investments were mainly made in China, Europe, and North America.

NET CASH USED IN FINANCING ACTIVITIES

Net cash used in financing activities amounted to \$(531) million and \$(469) million for the years 2022 and 2021, respectively.

In 2022, the Company paid dividends of \$224 million. In 2021, the Company paid dividends of \$165 million after reinstating the dividends in the second quarter of 2021.

INCOME TAXES

The Company has reserves for taxes that may become payable in future periods as a result of tax audits. At any given time, the Company is undergoing tax audits covering multiple years in several tax jurisdictions. Ultimate outcomes are uncertain but could, in future periods, have a significant impact on the Company's cash flows. See discussions of income taxes under Significant Accounting Policies in this section, Note 2, Summary of Significant Accounting Policies, and Note 5, Income Taxes, to the Consolidated Financial Statements included herein.

PENSION ARRANGEMENTS

The Company has defined benefit pension plans covering nearly half of the U.S. employees. As of December 31, 2021, the main U.S. defined benefit plan was frozen for further benefits. Many of the Company's non-U.S. employees are also covered by pension arrangements.

At December 31, 2022, the Company's net pension liability (i.e. the actual funded status) for its U.S. and non-U.S. plans was \$154 million compared to \$197 million at December 31, 2021. The decrease in the total net pension liability in 2022 of \$43 million was mainly due to the increase in discount rates, partly offset by lower performance than expected of the plan assets.

The plans had a net unamortized actuarial loss before tax of \$44 million recorded in Accumulated Other Comprehensive (Loss) Income in the Consolidated Balance Sheets at December 31, 2022, compared to \$68 million at December 31, 2021. The decrease in the actuarial loss was mainly due to settlement and curtailment gains in the non-U.S. plans during 2022. The amortization of the loss is expected to be \$1 million in 2023.

Pension expense associated with the defined benefit plans was \$11 million in 2022 and \$24 million in 2021, and is expected to be \$19 million in 2023. The \$13 million decrease in 2022 pension expense was mainly due to the benefit freeze of the U.S. plan and settlement and curtailment gains in the non-U.S. plans.

The Company contributed \$22 million to its defined benefit plans in 2022 and \$25 million in 2021. The Company expects to contribute \$9 million to these plans in 2023 and is currently projecting a yearly funding at approximately the same level in the subsequent years.

For further information about retirement plans see Note 18, Retirement Plans, to the Consolidated Financial Statements included herein.

SHAREHOLDER RETURNS

In 2022, the Company paid cash dividends of \$224 million. The Company paid \$165 million in dividends in 2021, after reinstating the dividend in the second quarter of 2021.

The Company repurchased shares to an amount of \$115 million in 2022.

EQUITY

During 2022, total equity decreased by \$22 million to \$2,626 million as of December 31, 2022. The change was mainly due to dividends paid of \$224 million, share repurchases of \$115 million and negative foreign exchange effects of \$136 million, partly offset by \$425 million from net income.

TREASURY ACTIVITIES

DEBT AND CREDIT ARRANGEMENTS

The Company's total debt as of December 31, 2022 and 2021 was \$1,766 million and \$2,008 million, respectively. The Company had a net debt position (see section Non-U.S. GAAP Performance Measures) at December 31, 2022 and 2021 of \$1,184 million and \$1,052 million, respectively.

In May 2022, the Company refinanced its existing revolving credit facility (RCF) of \$1,100 million. The facility, syndicated among 11 banks, matures in May 2027 and has two extension options, each for an additional year. The Company pays a commitment fee on the undrawn amount of 0.15%, representing 35% of the applicable margin, which is 0.425% (given the Company's rating of "BBB" from S&P Global Ratings). Borrowings under the facility are unsecured. As of December 31, 2022, the facility was not utilized.

In June 2020, the Company utilized its SEK 3,000 million facility with Swedish Export Credit Corporation which was signed in May 2020. The SEK 3,000 million loan mature in 2025 carrying a floating interest rate of 3M STIBOR +1.85%.

In June 2018, the Company priced and issued 5-year notes for a total of €500 million in the Eurobond market. The notes carry a coupon of 0.75% and matures in 2023.

In 2014, the Company issued and sold long-term debt securities in a U.S. Private Placement pursuant to a Note Purchase and Guaranty Agreement dated April 23, 2014, by and among Autoliv ASP Inc., the Company and the purchasers listed therein. As of December 31, 2022, \$767 million remains outstanding from the 2014 issuance.

The Company has a €3,000 million Euro Medium Term Note Program in place for being able to issue notes to be traded on the Global Exchange Market of Euronext Dublin. On December 31, 2022, no notes had been issued under this program.

At December 31, 2022, Autoliv's long-term credit rating from S&P Global Ratings was BBB with stable outlook. The Company aims to maintain a strong investment grade credit rating.

For additional information about the Company's debt and credit arrangements, see Note 13, Debt and Credit Agreements, to the Consolidated Financial Statements included herein.

FACTORING

During 2022 and 2021, the Company sold receivables and discounted notes related to selected customers. These factoring arrangements increase cash while reducing accounts receivable and customer risks. At December 31, 2022, the Company had received \$174 million for sold receivables without recourse and discounted notes with a discount cost of \$2 million during the year, compared to \$159 million at December 31, 2021 with a discount cost of \$2 million recorded in Other non-operating items, net.

NUMBER OF SHARES

At December 31, 2022, 86.2 million shares were outstanding (net of 5.0 million treasury shares), a 1.5% decrease from 87.5 million one year earlier.

The number of shares outstanding is expected to increase by 0.3 million when all Restricted Stock Units (RSU) and Performance Shares (PSs) vest and if all stock options (SOs) to key employees are exercised, see Note 16, Stock Incentive Plans, to the Consolidated Financial Statements included herein.

In 2022, the Company retired 10 million shares of common stock that had been repurchased under a prior stock repurchase program and since held in treasury. These shares were acquired between 2008 and 2014. During 2022, Autoliv repurchased and retired 1.44 million shares, equal to \$115 million, under the current stock repurchase program authorized by the Board to repurchase up to \$1.5 billion, or 17 million common shares (whichever comes first), between January 2022 and the end of 2024.

Contractual Obligations and Commitments

Contractual obligations include debt, sponsored defined benefit plans, lease and purchase obligations that are enforceable and legally binding on the Company.

For material contractual debt obligations as of December 31, 2022, see Note 13, Debt and Credit Agreements, to the Consolidated Financial Statements included herein.

Operating lease obligations represent the payment obligations (undiscounted cash flows) under leases classified as operating leases. Capital lease obligations are not material. See Note 3, Leases, to the Consolidated Financial Statements included herein.

There are no unconditional purchase obligations other than short-term obligations related to inventory, services, tooling, and property, plant and equipment purchased in the ordinary course of business. Purchase agreements with suppliers entered into in the ordinary course of business do not generally include fixed quantities. Quantities and delivery dates are established in "call off plans" accessible electronically for all customers and suppliers involved. Communicated "call off plans" for production material from suppliers are normally reflected in equivalent commitments from Autoliv customers.

The Company sponsors defined benefit plans that cover a significant portion of the Company's U.S. employees and certain non-U.S. employees. The pension plans in the U.S. are funded in conformity with the minimum funding requirements of the Pension Protection Act of 2006. Funding for the Company's pension plans in other countries is based upon plan provisions, actuarial recommendations and/or statutory requirements. Due to volatility associated with future changes in interest rates and plan asset returns, the Company cannot predict with reasonable reliability the timing and amounts of future funding requirements. The Company may elect to make contributions in excess of the minimum funding requirements for the U.S. plans in response to investment performance and changes in interest rates, or when the Company believes that it is financially advantageous to do so and based on other capital requirements. See Note 18, Retirement Plans, to the Consolidated Financial Statements included herein.

Risks and Risk Management

The Company is exposed to several categories of risks. They can broadly be categorized as operational risks, strategic risks and financial risks. Some of the major risks in each category are described below. There are also other risks that could have a material effect on the Company's results and financial position, and the description below is not complete but should be read in conjunction with the discussion of risks described in Item 1A above, which contains a description of the Company's material risks.

As described below, the Company has taken several mitigating actions, applied numerous strategies, adopted policies, and introduced control and reporting systems to reduce and mitigate these risks. In addition, the Company from time to time identifies and evaluates emerging or changing risks to the Company in order to ensure that identified risks and related risk management are updated in this fast-moving environment.

Operational Risks

LIGHT VEHICLE PRODUCTION

Around 30% of Autoliv's costs are fixed; therefore, short-term earnings are dependent on sales volumes and highly dependent on capacity utilization in the Company's plants.

Global LVP is an indicator of the Company's sales development. Ultimately, however, sales are determined by the production levels for the individual vehicle models for which Autoliv is a supplier (see Dependence on Customers). The Company's sales are split over several hundred contracts covering more than 1,300 vehicle models. This moderates the effect of changes in vehicle demand of individual countries and regions as well as production issues. The risk of fluctuating sales has also been mitigated by Autoliv's rapid expansion in Asia and other growth markets, which has reduced the Company's former high dependence on sales in Europe to a diversified mix with Europe, the Americas and Asia each accounting for roughly 27%, 33% and 40%, respectively, of the Company's 2022 total sales.

It is the Company's strategy to reduce the risks associated with fluctuating LVP by using temporary personnel in direct production, when appropriate. During 2022 and 2021, the level of temporary personnel in relation to total personnel in direct production was 13% and 9%, respectively. To reduce the potential impact of unusual fluctuations in the production of vehicle models supplied by the Company such as during the financial crisis in 2008-2009 and the COVID-19 pandemic in 2020-2021 – it is also necessary for the Company to be prepared to quickly adapt the level of permanent employees as well as fixed cost production capacity.

PRICING PRESSURE

Pricing pressure from customers is an inherent part of the automotive components business. The historical extent of price reductions varies from year to year and takes the form of one time give backs, reductions in direct sales prices and/or discounted reimbursements for engineering work.

In response, Autoliv is continuously engaged in efforts to reduce costs and to provide customers added value by developing new products. Generally, the speed by which these cost-reduction programs generate results will, to a large extent, determine the future profitability of the Company. The various cost-reduction programs are, to a considerable extent, interrelated. This interrelationship makes it difficult to isolate the impact of costs on any single program, therefore, the Company monitors key measures such as costs in relation to sales and productivity.

In 2022, due to unprecedented raw material price increases the Company engaged in extensive negotiations with its customers regarding price compensation and an increased element of tying pricing to raw material prices.

COMPONENT COSTS AND RAW MATERIAL PRICES

The cost of direct materials was approximately 52% of sales in 2022.

The main raw materials being used as input material for the Company's operations are steel, textiles, plastic and non-ferrous metals.

The Company still sees effects coming from import tariffs and trade barriers across borders. These barriers are impacting the raw material market and creating pricing and availability uncertainties.

Inflation was significant across raw materials and services in 2022. The Company took action including pricing discussions with customers and suppliers, competitive sourcing and exploring alternative materials.

LEGAL

The Company is involved from time to time in regulatory, commercial, and contractual legal proceedings that may be significant, and the Company's business may suffer as a result of adverse outcomes of current or future legal proceedings. These claims may include, without limitation, commercial or contractual disputes, including disputes with the Company's suppliers and customers, intellectual property matters, alleged violations of laws, rules or regulations, governmental investigations, personal injury claims, product liability claims, environmental issues, tax and customs matters, and employment matters.

A substantial legal liability or adverse regulatory outcome and the substantial cost to defend the litigation or regulatory proceedings may have an adverse effect on the Company's business, operating results, financial condition, cash flows and reputation.

No assurances can be given that such proceedings and claims will not have a material adverse impact on the Company's profitability and consolidated financial position, or that reserves or insurance will mitigate such impact. See Note 17, Contingent Liabilities, to the Consolidated Financial Statements included herein and Item 3 – Legal Proceedings.

PRODUCT WARRANTY AND RECALLS

If our products are alleged to fail to perform as expected or are defective, the Company may be exposed to various claims for damages and compensation. Such claims may result in costs and other losses to the Company even where the relevant product is eventually found to have functioned properly. If a product (actually or allegedly) fails to perform as expected or is defective, we may face warranty and recall claims. If such actual or alleged failure or defect results, or is alleged to result, in bodily injury and/or property damage, we may also face product liability and other claims. The Company may experience material warranty, recall, product or other liability claims or losses in the future, and the Company may incur significant cost to defend against such claims. The Company may be required to participate in a recall involving its products. Each vehicle manufacturer has its own practices regarding product recalls and other product liability actions relating to its suppliers. Government safety regulators also have policies and practices with respect to recalls. As suppliers become more integrally involved in the vehicle design process and assume more of the vehicle assembly functions, vehicle manufacturers are increasingly looking to their suppliers for contribution when faced with recalls and product liability claims. In addition, with global platforms and procedures, vehicle manufacturers are increasingly evaluating our quality performance on a global basis. Any one or more quality, warranty or other recall issue(s), including the ones affecting few units and/or having a small financial impact, may cause a vehicle manufacturer to implement measures which may have a severe impact on the Company's operations, such as a temporary or prolonged suspension of new orders or the Company's ability to bid for new business.

In addition, over time, there is a risk that the number of vehicles affected by a failure or defect will increase significantly (as would the Company's costs), since our products often use global designs and are increasingly based on or utilize the same or similar parts, components, or solutions.

Although quality has always been a central focus in the automotive industry, especially for safety products, our customers and regulators have become increasingly attentive to quality with even less tolerance for any deviations, which has resulted in an increase in the number of automotive recalls. This trend is likely to continue as automobile manufacturers introduce even stricter quality requirements and regulating agencies and other authorities increase the level of scrutiny given to vehicle safety issues. A warranty recall or a product liability claim brought against the Company in excess of the Company's insurance may have a material adverse effect on its business and/or financial results. Vehicle manufacturers are also increasingly requiring their external suppliers to guarantee or warrant their products and bear the costs of repair and replacement of such products under new vehicle warranties. A vehicle manufacturer may attempt to hold the Company responsible for some or all of the repair or replacement costs of defective products under new vehicle warranties when the product supplied did not perform as represented. Additionally, a customer may not allow us to bid for expiring or new business until certain remedial steps have been taken. Accordingly, the future costs of warranty claims by the Company's customers may be material.

The Company's warranty reserves are based upon management's best estimates of amounts necessary to settle future and existing claims. Management regularly evaluates the appropriateness of these reserves and adjusts them when we believe it is appropriate to do so. However, the final amounts determined to be due could differ materially from the Company's recorded estimates. We believe our established reserves are adequate to cover potential warranty settlements typically seen in our business.

The Company's strategy is to follow a stringent procedure when developing new products and technologies and to apply a proactive "zero-defect" quality policy (see section Quality Management). In addition, the Company maintains a program of insurance, which may include commercial insurance, self-insurance, or a combination of both approaches, for potential recall and product liability claims in amounts and on terms that it believes are reasonable and prudent based on our prior claims experience. However, such insurance may not be sufficient to cover every possible claim that can arise in the Company's businesses, now or in the future, or may not always will be available should the Company, now or in the future, wish to extend, renew, increase or otherwise adjust such insurance. In recent years, the cost of recall and product liability insurance as well as the Company's level of self-insurance and deductibles has increased. Management's decision regarding what insurance to procure is also impacted by the cost for such insurance. As a result, the Company may face material losses in excess of the insurance coverage procured. A substantial recall or liability in excess of coverage levels could therefore have a material adverse effect on the Company.

ENVIRONMENTAL

Most of the Company's manufacturing processes consist of the assembly of components. As a result, the environmental impact from the Company's plants is generally modest. While the Company's businesses from time to time are subject to environmental investigations, there are no material environmental-related cases pending against the Company. Therefore, Autoliv does not incur (or expect to incur) any material costs or capital expenditures associated with maintaining facilities compliant with U.S. or non-U.S. environmental requirements. To reduce environmental risk, the Company has implemented an environmental management system in all plants globally and has adopted an environmental policy (see corporate website www.autoliv.com).

Autoliv is subject to a number of environmental and occupational health and safety laws and regulations. Such requirements are complex and are generally becoming more stringent over time. There can be no assurance that these requirements will not change in the future, or that the Company will at all times be in compliance with all such requirements and regulations, despite its intention to be. The Company may also find itself subject, possibly due to changes in legislation or other regulation, to environmental liabilities based on the activities of its predecessor entities or of businesses acquired. Such liability could be based on activities which are not related to the Company's current activities.

TRADE

Autoliv is subject to various international trade regulations and regimes and changes in these regimes could lead to increased compliance costs and costs of raw materials and other components. In addition, political conditions leading to trade conflicts and the imposition of tariffs or other trade barriers between countries in which the Company does business could increase its costs of doing business.

Strategic Risks

REGULATIONS

In addition to vehicle production, the Company's market is driven by the safety content per vehicle, which is affected by new regulations and new vehicle rating programs, in addition to consumer demand for new safety technologies.

The most important regulations are the seatbelt installation laws that exist in all vehicle-producing countries. Many countries also have strict enforcement laws on the wearing of seatbelts. Another significant vehicle safety regulation is the U.S. federal law that, since 1997, requires frontal airbags for both the driver and the front-seat passenger in all new vehicles sold in the U.S.

In 2007, the U.S. adopted new regulations for head impact and enhanced thorax protection in side impact crashes, which now have been fully phased-in. China introduced a vehicle rating program in 2006 and during the past 16 years this China NCAP, together with the additional Chinese rating program, C-NCAP, from 2017, drive Chinese vehicle safety performance and safety content with regards to crashworthiness and occupant protection. Latin America introduced a basic rating program in 2010 followed by ASEAN NCAP in Southeast Asia in 2011, and Global NCAP is rating vehicles sold in significant emerging markets. Several countries, e.g., Malaysia and Thailand, are increasingly adopting the UN Regulations regarding vehicle safety under the UN 1958 agreement, and Malaysia started a world first motorcycle safety rating program in 2021.

The United States upgraded its vehicle rating program, US NCAP, in 2010, which now is in the process of being updated by the U.S. National Highway Traffic Safety Administration. Europe upgraded the Euro NCAP rating system during 2018, and is now completing a new upgrade, intended to be fully implemented by 2025. Japan and South Korea are continuously upgrading their respective vehicle rating programs, JNCAP and KNCAP respectively. India requires frontal airbags for the driver from July 2019, and passenger airbags from 2021 for all new passenger vehicles (M1), moreover has announced that side airbags shall become mandatory in 2023. In addition, India has announced that its Bharat NCAP shall start in 2023.

Vehicles with automated driving systems (ADS) are expected to provide additional opportunities through integration of protective safety systems with ADAS technologies, as well as new vehicle interior layouts and seating configurations. This development is likely to become subject to legal requirements.

There are also other plans for improved automotive safety through new or changed regulations, both in these countries and others that could affect the Company's market. However, there can be no assurance that changes in regulations will not adversely affect the demand for the Company's products or, at least, result in a slower increase in the demand for them.

DEPENDENCE ON CUSTOMERS

As a result of this highly consolidated market, the Company is dependent on a relatively small number of customers with strong purchasing power. In 2022, the five largest vehicle manufacturers accounted for around 48% of global LVP and the ten largest manufacturers accounted for around 70% of global LVP. In 2022, the Company's five largest customers accounted for around 49% of consolidated sales and the ten largest customers accounted for around 80% of consolidated sales. The Company's largest customer contract accounted for around 2% of consolidated sales in 2022.

Customer	% of Autoliv sales	% of Global LVP ¹⁾
Renault/Nissan/Mitsubishi	11%	8%
Stellantis	11%	7%
VW	10%	11%
Toyota	9%	13%
Honda	8%	5%
Ford	8%	4%
Hyundai	7%	9%
General Motors	7%	6%
Major EV maker	5%	2%
BMW	4%	3%

1) Source: S&P Global

Although business with every major customer is split into at least several contracts (usually one contract per vehicle platform) and although the customer base has become more balanced and diversified as a result of the Company's significant expansion in China and other rapidly-growing markets, the loss of all business from a major customer (whether by a cancellation of existing contracts or not awarding Autoliv new business), the consolidation of one or more major customers or a bankruptcy of a major customer could have a material adverse effect on the Company. In addition, a quality issue, shortcomings in the Company's service to a customer or uncompetitive prices or products could result in the customer not awarding the Company new business, which will gradually have a negative impact on the Company's sales when current contracts start to expire.

See also Note 20, Segment Information, to the Consolidated Financial Statements included herein.

CUSTOMER PAYMENT RISK

Another risk related to the Company's customers is the risk that one or more of its customers will be unable to pay their invoices that become due. The Company seeks to limit this customer payment risk by invoicing its major customers through their local subsidiaries in each country, even for global contracts. By invoicing this way, the Company attempts to avoid having the receivables with a multinational customer group exposed to the risk that a bankruptcy or similar event in one country would put all receivables with such customer group at risk. In each country, the Company also monitors invoices becoming overdue.

Even so, if a major customer is unable to fulfill its payment obligations, it is likely that the Company would be forced to record a substantial loss on such receivables.

DEPENDENCE ON SUPPLIERS

The Company relies on internal and/or external suppliers in order to meet its delivery commitments to the customers. In some cases, suppliers are dictated by the customers. The Company's supply chain organization continually reviews sourcing risks and actively works on mitigating related supply chain risks.

The Company's ambition is to maintain an optimal number of suppliers in all significant component technologies.

NEW COMPETITION

Increased competition may result in price reductions, reduced margins and the Company's inability to gain or hold market share. OEMs rigorously evaluate suppliers on the basis of product quality, price, reliability and delivery as well as engineering capabilities, technical expertise, product innovation, financial viability, application of lean principles, operational flexibility, customer service, and overall management. To maintain the Company's competitiveness and position as a market leader, it is important to focus on all of these aspects of supplier evaluation and selection.

Although the market for occupant restraint systems has undergone a significant consolidation during the past ten years, the passive safety market remains very competitive. It cannot be excluded that additional competitors, both global and local, will seek to enter the market or grow beyond their current Keiretsu group or traditional customer base. Particularly in China, South Korea, and Japan there are numerous small domestic competitors often supplying just one OEM group.

PATENTS AND PROPRIETARY TECHNOLOGY

The Company's strategy is to protect its innovations with patents, and to vigorously protect and defend its patents, trademarks, and know-how against infringement and unauthorized use. At the end of 2022, the Company held more than 6,600 patents and patents applications. These patents expire on various dates during the period from 2023 to 2042. The expiration of any single patent is not expected to have a material adverse effect on the Company's financial results.

Although the Company believes that its products and technology do not infringe upon the proprietary rights of others, there can be no assurance that third parties will not assert infringement claims against the Company in the future. Also, there can be no assurance that any patent now owned by the Company will afford protection against competitors that develop similar technology. As the Company continues to expand its products and expand into new businesses, it will increase its exposure to intellectual property claims.

Financial Risks

The Company is exposed to financial risks through its operations. To reduce the financial risks and to take advantage of economies of scale, the Company has a central treasury department supporting operations and management. The treasury department handles external financial transactions and functions as the Company's in-house bank for its subsidiaries.

The Board of Directors monitors compliance with the financial risk policy on an on-going basis. For information about specific financial risks, see Item 7A – Quantitative and Qualitative Disclosures about Market Risk.

Significant Accounting Policies and Critical Accounting Estimates

NEW ACCOUNTING STANDARDS

The Company has considered all applicable recently issued accounting standards. The Company has summarized in Note 2, Summary of Significant Accounting Policies, to the Consolidated Financial Statements each of the recently issued accounting standards and stated the impact or whether management is continuing to assess the impact.

APPLICATION OF CRITICAL ACCOUNTING POLICIES

The Company's significant accounting policies are disclosed in Note 2, Summary of Significant Accounting Policies, to the Consolidated Financial Statements included herein. Senior management has discussed the development and selection of critical accounting estimates and disclosures with the Audit Committee of the Board of Directors. The application of accounting policies necessarily requires judgments and the use of estimates by a Company's management. Actual results could differ from these estimates. By their nature, these judgments are subject to an inherent degree of uncertainty. These judgments are based on the Company's historical experience, terms of existing contracts, and management's evaluation of trends in the industry, information provided by the Company's customers and information available from other outside sources, as appropriate. The Company considers an accounting estimate to be critical if:

- It requires management to make assumptions about matters that were uncertain at the time of the estimate, and
- Changes in the estimate or different estimates that could have been selected would have had a material impact on the Company's financial condition or results of operations. The accounting estimates that require management's most significant judgments include the estimation of variable considerations, assessment of recoverability of goodwill and intangible assets, estimation of pension benefit obligations based on actuarial assumptions, estimation of accruals for warranty and recalls, restructuring charges, uncertain tax positions, valuation allowances and legal proceedings.

The Company has summarized its critical accounting policies requiring judgment below. These might change over time based on the current facts and circumstances.

REVENUE RECOGNITION

In accordance with ASC 606, *Revenue from Contracts with Customers*, revenue is measured based on consideration specified in a contract with a customer, adjusted for any variable consideration (i.e. price concessions) and estimated at contract inception. The estimated amount of variable consideration that will be received by the Company are based on historical experience and trends, management's understanding of the status of negotiations with customers and anticipated future pricing strategies. The Company recognizes revenue when it satisfies a performance obligation by transferring control over a product to a customer.

In addition, from time to time, the Company may make payments to customers in connection with ongoing and future business. These payments to customers are generally recognized as a reduction to revenue at the time of the commitment to make these payments unless the payment concession can be clearly linked to the future business award. If the payments are capitalized, the amounts are amortized to revenue as the related goods are transferred.

INVENTORY RESERVES

Inventories are evaluated based on individual or, in some cases, groups of inventory items. Reserves are established to reduce the value of inventories to the lower of cost or net realizable value. Net realizable value is the estimated selling prices in the ordinary course of business, less reasonably predictable costs of completion, disposal and transportation. Excess inventories are quantities of items that exceed anticipated sales or usage for a reasonable period. The Company has guidelines for calculating provisions for excess inventories based on the number of months of inventories on hand compared to anticipated sales or usage. Management uses its judgment to forecast sales or usage and to determine what constitutes a reasonable period.

There can be no assurance that the amount ultimately realized for inventories will not be materially different than that assumed in the calculation of the reserves.

GOODWILL

The Company performs an annual impairment test of goodwill in the fourth quarter of each year following the Company's annual forecasting process. As of October 2022 the Company concluded that there were no impairments of goodwill. For further information, see Note 2, Summary of Significant Accounting Policies, to the Consolidated Financial Statements.

RECALL PROVISIONS AND WARRANTY OBLIGATIONS

The Company records liabilities for product recalls when probable claims are identified and when it is possible to reasonably estimate costs. Recall costs are costs incurred when the customer decides to formally recall a product due to a known or suspected safety concern. Product recall costs are estimated based on the expected cost of replacing the product and the customer's cost of carrying out the recall, which is affected by the number of vehicles subject to recall and the cost of labor and materials to remove and replace the defective product. The Company maintains a program of insurance, which may include commercial insurance, self-insurance, or a combination of both approaches, for potential recall and product liability claims in amounts and on terms that it believes are reasonable and prudent based on our prior claims experience. The Company's insurance policies generally include coverage of the costs of a recall, although costs related to replacement parts are generally not covered. Actual costs incurred could differ from the amounts estimated, requiring adjustments to these reserves in future periods. It is possible that changes in our assumptions or future product recall issues could materially affect our financial position, results of operations or cash flows.

Estimating warranty obligations requires the Company to forecast the resolution of existing claims and expected future claims on products sold. The Company bases the estimate on historical trends of units sold and payment amounts, combined with our current understanding of the status of existing claims and discussions with our customers. These estimates are re-evaluated on an ongoing basis. Actual warranty obligations could differ from the amounts estimated requiring adjustments to existing reserves in future periods. Due to the uncertainty and potential volatility of the factors contributing to developing these estimates, changes in our assumptions could materially affect our results of operations.

RESTRUCTURING PROVISIONS

The Company defines restructuring expense to include costs directly associated with capacity alignment programs, plus exit or disposal activities. Estimates of restructuring charges are based on information available at the time such charges are recorded. In general, management anticipates that restructuring activities will be completed within a time frame such that significant changes to the exit plan are not likely.

Due to inherent uncertainty involved in estimating restructuring expenses, actual amounts paid for such activities may differ from amounts initially estimated.

DEFINED BENEFIT PENSION PLANS

The Company has defined benefit pension plans in thirteen countries. The most significant plans exist in the U.S. These U.S. plans represent approximately 54% of the Company's total pension benefit obligation. See Note 18, Retirement Plans to the Consolidated Financial Statements included herein.

The Company, in consultation with its actuarial advisors, determines certain key assumptions to be used in calculating the projected benefit obligation and annual pension expense. For the U.S. plans, the assumptions used for calculating the 2022 pension expense were a discount rate of 2.77% and an expected long-term rate of return on plan assets of 5.05%.

The assumptions used in calculating the U.S. benefit obligations disclosed as of December 31, 2022 were a discount rate of 5.41%. The discount rate for the U.S. plans has been set based on the rates of return of high-quality fixed-income investments currently available at the measurement date and are expected to be available during the period the benefits will be paid. The expected rate of long-term return on plan assets are determined based on a number of factors and must take into account long-term expectations and reflect the financial environment in the respective local markets. At December 31, 2022, 23% of the U.S. plan assets were invested in equities, which is below the target of 40%.

The table below illustrates the sensitivity of the U.S. net periodic benefit cost and projected U.S. benefit obligation to a 1pp change in the discount rate and decrease in return on plan assets for the U.S. plans (in millions). The use of actuarial assumptions is an area of management's estimate.

Assumption (in millions)	Change	2022 net periodic benefit cost increase (decrease)	2022 projected benefit obligation increase (decrease)
Discount rate	1pp increase	\$ 2	\$ (18)
Discount rate	1pp decrease	(1)	21
Return on plan assets	1pp decrease	3	n/a

INCOME TAXES

Significant judgment is required in determining the worldwide provision for income taxes. In the ordinary course of a global business, there are many transactions for which the ultimate tax outcome is uncertain. Many of these uncertainties arise as a consequence of intercompany transactions.

Although the Company believes that its tax return positions are supportable, no assurance can be given that the final outcome of these matters will not be materially different than that which is reflected in the historical income tax provisions and accruals. Such differences could have a material effect on the income tax provisions or benefits in the periods in which such determinations are made. See also the discussion of reserves for uncertain tax positions, and the determinations of valuation allowances on the Company's deferred tax assets in Note 5, Income Taxes, to the Consolidated Financial Statements.

CONTINGENT LIABILITIES

Various claims, lawsuits and proceedings are pending or threatened against the Company or its subsidiaries, covering a range of matters that arise in the ordinary course of its business activities with respect to commercial, product liability or other matters.

The Company diligently defends itself in such matters and, in addition, carries insurance coverage to the extent reasonably available against insurable risks.

The Company records liabilities for claims, lawsuits and proceedings when they are probable and it is possible to reasonably estimate the cost of such liabilities. Legal costs expected to be incurred in connection with a loss contingency are expensed as such costs are incurred.

A loss contingency is accrued by a charge to income if it is probable that an asset has been impaired or a liability has been incurred and the amount of the loss can be reasonably estimated. In determining whether a loss should be accrued management evaluates, among other factors, the degree of probability of an unfavorable outcome and the ability to make a reasonable estimate of the amount of loss. Changes in these factors could materially impact the Company's consolidated financial statements.

Item 7A. Quantitative and Qualitative Disclosures about Market Risk

The Company is exposed to several markets risks in the ordinary course of business including risks related to currencies, interest rates, financing, capital structure and credit ratings and impairment. See also Note 2, Summary of Significant Accounting Policies to the Consolidated Financial Statements included with this Annual Report for information about how these risks are quantified.

CURRENCY RISKS

1. Transaction Exposure and Revaluation effects

Transaction exposure arises because the cost of a product originates in one currency and the product is sold in another currency. Revaluation effects come from valuation of assets denominated in other currencies than the reporting currency of each unit.

The Company's net transaction exposure in 2022 was approximately \$2.1 billion. The four largest net exposures are U.S. dollars (sell) against the Mexican Peso, U.S. dollars (sell) against Canadian dollar, Romanian Lei (buy) against the Euro and U.S. dollars (buy) against Korean Won. Together these currencies accounted for approximately 50% of the Company's net currency transaction exposure.

Since the Company can only effectively hedge these currency flows in the short term, periodic hedging would only reduce the impact of fluctuations temporarily. Over time, periodic hedging would postpone but not reduce the impact of fluctuations. In addition, the net exposure is limited to only around one quarter of net sales and is made up of around 50 different currency pairs with exposures of more than \$1 million each. The Company generally does not hedge these flows.

2. Translation Exposure in the Income Statement and Balance Sheet

Another effect of exchange rate fluctuations arises when the income statements of non-U.S. subsidiaries are translated into U.S. dollars. Outside the U.S., the Company's most significant currency is the Euro. The Company estimates that 26% of its consolidated net sales will be denominated in Euro or other European currencies during 2023, while 21% of its consolidated net sales are estimated to be denominated in U.S. dollars.

The Company estimates that a 1% increase in the value of the U.S. dollar versus European currencies will decrease reported U.S. dollar annual net sales in 2023 by \$27 million or by 0.3%, while operating income for 2023 will decline by approximately 0.3% or by about \$2 million, assuming reported corporate average margin.

The Company's policy is not to hedge this type of translation exposure.

A translation exposure also arises when the balance sheets of non-U.S. subsidiaries are translated into U.S. dollars. The policy of the Company is to finance major subsidiaries in the country's local currency and to minimize the amounts held by subsidiaries in foreign currency accounts.

Consequently, changes in currency rates relating to funding and foreign currency accounts normally have a small impact on the Company's income. In 2022 and 2021, the impact from the Company's currency exposure were not material.

INTEREST RATE RISK

Interest rate risk refers to the risk that interest rate changes will affect the Company's borrowing costs. The Company's interest rate risk policy states that the average interest rate fixing period should be minimum 1 year and maximum 5 years.

At December 31, 2022, the average interest rate fixing period for the Company's outstanding debt was 1.6 years, and at December 31, 2021, the average interest rate fixing period for the Company's outstanding debt was 2.1 years.

Given the Company's current capital structure, the Company estimates that a one-percentage point interest rate increase would decrease net interest expense by approximately \$4 million in 2023. This is based on the capital structure at the end of 2022 when the gross fixed-rate debt was \$767 million while the Company had a net debt position of \$1,184 million (see section Non-U.S. GAAP Performance Measures). Thus, a change in the interest rate environment would not have a notable impact on the Company's interest expense. As of December 31, 2022, the Company had \$594 million in cash and cash equivalents of which the majority were subject to a floating interest rate. Taking the cash and cash equivalents of \$594 million (which is primarily subject to floating interest rates) minus the portion of debt carrying floating interest rates, the Company estimated that a one-percentage point interest rate increase would decrease net interest expense by approximately \$4 million, both in 2023 and 2024.

Fixed interest rate debt is achieved both by issuing fixed rate notes and through interest rate swaps. The most notable debt carrying fixed interest rates is the \$767 million U.S. private placement notes issued in 2014. For additional information, see Note 13, Debt and Credit Agreements, to the Consolidated Financial Statements included herein.

FINANCING RISK

Financing risk refers to the risk that it will be difficult and/or expensive to finance new or existing debt to meet the financing needs of the Autoliv Group.

The management of the financing risk ensures access to funding in a cost-efficient way by diversification of funding sources and debt maturities.

Autoliv has diversified its long-term funding sources by issuing notes in the USPP and Eurobond markets, and by signing a long-term credit agreement with 11 banks. The Company also has a lending facility with the Swedish Export Credit Corporation.

The Company has Medium Term Note Program in place for being able to issue notes to be traded on the Global Exchange Market of Euronext Dublin. The Company also has established programs for short-term issuance of commercial papers in the Swedish and US markets and short-term credit agreements, e.g. bank overdrafts and money market loans.

To ensure diversification of debt maturities, no more than 20% of the Autoliv Group's total debt may mature the next 12 months, unless such maturities (in excess of 20%) are covered by unutilized committed credit facilities with maturity in excess of 12 months. Per December 31, 2022, 40% corresponding to \$711 million of the Autoliv Group's total debt had maturity less than 12 months. This amount was fully covered by unutilized committed credit facilities with maturity in excess of 12 months.

CAPITAL STRUCTURE AND CREDIT RATING

The overall objective relating to Autoliv's target capital structure and credit rating is to provide the Company with sufficient flexibility to manage the inherent risks and cyclicity in Autoliv's business and allow the Company to realize strategic opportunities and fund growth initiatives while creating shareholder value.

Autoliv is committed to maintain a "strong investment grade credit rating." As of December 31, 2022, the Company had a long-term credit rating from S&P Global Ratings ("S&P") of BBB.

The amount of interest-bearing debt held impacts the future financial flexibility as well as the credit rating. Management uses the non-U.S. GAAP measure "Leverage Ratio" to analyze the amount of debt the Company can incur under its debt policy. Management believes that this policy also provides guidance to credit and equity investors regarding the extent to which the Company would be prepared to leverage its operations. Autoliv's long-term target for the leverage ratio (sum of net debt plus pension liabilities divided by EBITDA) is 1.0x with the aim to operate within the range of 0.5x to 1.5x. At December 31, 2022, the leverage ratio (non-U.S. GAAP measure, see calculation table below) was 1.4x. For details and calculation of leverage ratio, refer to the table below.

CALCULATION OF LEVERAGE RATIO (DOLLARS IN MILLIONS)

	December 31,	
	2022	2021
Net debt ¹⁾	\$ 1,184	\$ 1,052
Pension liabilities	154	197
Debt per the Policy	1,338	1,248
Net income ²⁾	425	437
Income taxes ²⁾	178	177
Interest expense, net ^{2,3)}	54	57
Other non-operating items, net ²⁾	5	7
Income from equity method investments ²⁾	(3)	(3)
Depreciation and amortization of intangibles ²⁾	363	394
Capacity alignments costs and antitrust related matters ²⁾	(61)	8
EBITDA per the Policy (Adjusted EBITDA)	\$ 961	\$ 1,077
Leverage ratio	1.4	1.2

1) Net debt is short- and long-term debt and debt-related derivatives less cash and cash equivalents (non-U.S. GAAP measure).

2) Latest 12 months.

3) Interest expense, net is interest expense including cost for extinguishment of debt, if any, less interest income.

CREDIT RISK IN FINANCIAL MARKETS

Credit risk refers to the risk of a financial counterparty being unable to fulfill an agreed-upon obligation.

In the Company's financial operations, credit risk arises when cash is deposited with banks and when entering into forward exchange agreements, swap contracts or other financial instruments.

The policy of the Company is to work with banks that have a high credit rating and that participate in Autoliv's financing.

To further reduce credit risk, deposits and financial instruments can only be entered into with core banks up to a calculated risk amount of \$200 million per bank for banks rated A- or above and up to \$50 million for banks rated BBB+. In addition, deposits can be made in U.S. and Swedish government short-term notes and certain AAA rated money market funds, as approved by the Company's Board of Directors. At December 31, 2022, the Company held \$237 million in AAA rated money market funds.

IMPAIRMENT RISK

Impairment risk refers to the risk that the Company will write down a material amount of its goodwill of close to \$1.4 billion as of December 31, 2022. This risk is assessed at least annually in the fourth quarter each year when the Company performs its impairment testing.

In 2022, the Company performed a quantitative impairment testing by calculating the fair value of its goodwill. The estimated fair market value of goodwill is determined by the discounted cash flow method. The Company discounts projected operating cash flows using its weighted average cost of capital. Estimating the fair value requires the Company to make judgments about appropriate discount rates, growth rates, relevant comparable company earnings multiples and the amount and timing of expected future cash flows.

It has been concluded that presently the Company is not "at risk" of failing the goodwill impairment test. However, there can be no assurance that goodwill will not be impaired due to future significant declines in LVP, due to the Company's technologies or products becoming obsolete or for any other reason. The Company could also acquire companies where goodwill could turn out to be less resilient to deteriorations in external conditions. See also discussion under Goodwill and Intangible Assets in Note 2, Summary of Significant Accounting Policies, and Note 10, Goodwill and Intangible Assets, to the Consolidated Financial Statements included herein.

Item 8. Financial Statements and Supplementary Data

The Consolidated Balance Sheets of Autoliv as of December 31, 2022 and 2021 and the Consolidated Statements of Income, Comprehensive Income, Cash Flows and Total Equity for each of the three years in the period ended December 31, 2022, the Notes to the Consolidated Financial Statements, and the Reports of the Independent Registered Public Accounting Firm are included below.

All of the schedules specified under Regulation S-X to be provided by Autoliv have been omitted either because they are not applicable, are not required or the information required is included in the financial statements or notes thereto.

Report of Independent Registered Public Accounting Firm

To the Shareholders and the Board of Directors of Autoliv, Inc.

Opinion on the Financial Statements

We have audited the accompanying consolidated balance sheets of Autoliv, Inc. (the Company) as of December 31, 2022 and 2021, the related consolidated statements of income, comprehensive income, total equity and cash flows for each of the three years in the period ended December 31, 2022, and the related notes (collectively referred to as the “consolidated financial statements”). In our opinion, the consolidated financial statements present fairly, in all material respects, the financial position of the Company at December 31, 2022 and 2021, and the results of its operations and its cash flows for each of the three years in the period ended December 31, 2022, in conformity with U.S. generally accepted accounting principles.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States) (PCAOB), the Company's internal control over financial reporting as of December 31, 2022, based on criteria established in Internal Control-Integrated Framework issued by the Committee of Sponsoring Organizations of the Treadway Commission (2013 framework) and our report dated February 16, 2023 expressed an unqualified opinion thereon.

Basis for Opinion

These financial statements are the responsibility of the Company's management. Our responsibility is to express an opinion on the Company's financial statements based on our audits. We are a public accounting firm registered with the PCAOB and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB.

We conducted our audits in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement, whether due to error or fraud. Our audits included performing procedures to assess the risks of material misstatement of the financial statements, whether due to error or fraud, and performing procedures that respond to those risks. Such procedures included examining, on a test basis, evidence regarding the amounts and disclosures in the financial statements. Our audits also included evaluating the accounting principles used and significant estimates made by management, as well as evaluating the overall presentation of the financial statements. We believe that our audits provide a reasonable basis for our opinion.

Critical Audit Matters

The critical audit matters communicated below are matters arising from the current period audit of the financial statements that were communicated or required to be communicated to the audit committee and that: (1) relate to accounts or disclosures that are material to the financial statements and (2) involved especially challenging, subjective, or complex judgments. The communication of critical audit matters does not alter in any way our opinion on the consolidated financial statements, taken as a whole, and we are not, by communicating the critical audit matters below, providing separate opinions on the critical audit matters or on the accounts or disclosures to which they relate.

Revenue recognition – Variable consideration related to price concessions

Description of the Matter

As discussed in Note 2 to the consolidated financial statements, the Company measures revenue based on consideration specified in a contract with a customer, adjusted for any variable consideration. Variability in consideration typically results from price concessions. The estimated amount of variable consideration that will be received by the Company related to price concessions is based on assumptions that include historical experience and trends, management's assessment of the probable outcome of its negotiations with customers and anticipated future pricing strategies. Estimating variable consideration to be received related to price concessions requires significant judgments by management that affect the amount of revenue recorded in the financial statements.

Auditing the amount of variable consideration expected to be received related to price concessions was complex because of the uncertainty inherent in the factors discussed above that management uses in its assumptions and calculations.

How We Addressed the Matter in Our Audit

We obtained an understanding, evaluated the design, and tested the operating effectiveness of internal controls related to variable consideration, including controls related to management's review of ongoing negotiations with customers.

To test the estimated amount of variable consideration expected to be received related to price concessions, our audit procedures included, among others, evaluating the Company's estimation methodology and testing the significant factors used in the calculations, as discussed above. These procedures included obtaining information from management and sales department representatives who were responsible for negotiations with customers to assess the reasonableness of assumptions related to variable considerations relative to current negotiations. We evaluated the Company's ability to estimate by comparing actual results to previous estimates and judgments made by management. We also performed journal entry testing focused on unusual and manual entries affecting revenue and on entries that could be indicative of price concessions that may not have been considered in the Company's assumptions and calculations.

Product recall liabilities

Description of the Matter

As discussed in Notes 2 and 12 to the consolidated financial statements, the Company is exposed to product liability claims in the event its products fail to perform as represented and such failure results, or is alleged to result, in bodily injury, and/or property damage or other loss. The Company records liabilities for product recalls when probable claims are identified and when it is possible to reasonably estimate costs. Actual costs incurred could differ from the amounts estimated, requiring adjustments to these reserves in future periods. Provisions for product recalls are estimated based on the expected cost of replacing the product and the customer's cost of carrying out the recall, which is affected by the number of vehicles subject to recall and the cost of labor and materials to remove and replace the defective product.

Auditing the product recall liabilities was complex due to the uncertainty inherent in the assumptions and estimates management uses to calculate these liability balances. These significant assumptions and estimates include the nature, likelihood, timing, and anticipated cost of known and potential claims.

How We Addressed the Matter in Our Audit

We obtained an understanding, evaluated the design, and tested the operating effectiveness of internal controls over the Company's product recall process, including controls related to management's review of the estimation calculations and significant assumptions discussed above.

To test product recall liabilities, our audit procedures included, among others, evaluating the Company's estimation methodology and testing the significant assumptions discussed above. We obtained information from Company personnel who are responsible for monitoring the status of product recalls with customers to assess the reasonableness of assumptions used. We evaluated the Company's ability to estimate by comparing actual results to previous estimates and judgments made by management. We also obtained letters from the Company's external legal counsel addressing material claims against the Company, if any, and examined relevant third-party automotive safety regulatory information to identify potential unrecorded product recall liabilities.

/s/ Ernst & Young AB

We have served as the Company's auditor since 1984.

Stockholm, Sweden
February 16, 2023

Report of Independent Registered Public Accounting Firm

To the Shareholders and the Board of Directors of Autoliv, Inc.

Opinion on Internal Control over Financial Reporting

We have audited Autoliv, Inc.'s internal control over financial reporting as of December 31, 2022, based on criteria established in Internal Control—Integrated Framework issued by the Committee of Sponsoring Organizations of the Treadway Commission (2013 framework) (the COSO criteria). In our opinion, Autoliv, Inc. (the Company) maintained, in all material respects, effective internal control over financial reporting as of December 31, 2022, based on the COSO criteria.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States) (PCAOB), the consolidated balance sheets of the Company as of December 31, 2022 and 2021, the related consolidated statements of income, comprehensive income, total equity and cash flows for each of the three years in the period ended December 31, 2022, and the related notes and our report dated February 16, 2023 expressed an unqualified opinion thereon.

Basis for Opinion

The Company's management is responsible for maintaining effective internal control over financial reporting and for its assessment of the effectiveness of internal control over financial reporting included in the accompanying Management's Report on Internal Control over Financial Reporting. Our responsibility is to express an opinion on the Company's internal control over financial reporting based on our audit. We are a public accounting firm registered with the PCAOB and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB.

We conducted our audit in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether effective internal control over financial reporting was maintained in all material respects.

Our audit included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, testing and evaluating the design and operating effectiveness of internal control based on the assessed risk, and performing such other procedures as we considered necessary in the circumstances. We believe that our audit provides a reasonable basis for our opinion.

Definition and Limitations of Internal Control Over Financial Reporting

A company's internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles. A company's internal control over financial reporting includes those policies and procedures that (1) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (2) provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the company are being made only in accordance with authorizations of management and directors of the company; and (3) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use, or disposition of the company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

/s/ Ernst & Young AB

Stockholm, Sweden
February 16, 2023

Consolidated Statements of Income

(DOLLARS AND SHARES IN MILLIONS, EXCEPT PER SHARE DATA)		Years ended December 31		
		2022	2021	2020
Net sales	Note 20	\$ 8,842	\$ 8,230	\$ 7,447
Cost of sales		(7,446)	(6,719)	(6,201)
Gross profit		1,396	1,511	1,247
Selling, general and administrative expenses		(437)	(432)	(389)
Research, development and engineering expenses, net		(390)	(391)	(376)
Amortization of intangibles	Note 10	(3)	(10)	(10)
Other income (expense), net	Notes 11, 17	93	(3)	(90)
Operating income		659	675	382
Income from equity method investment	Note 8	3	3	2
Interest income		6	4	5
Interest expense	Note 13	(60)	(60)	(73)
Other non-operating items, net		(5)	(7)	(25)
Income before income taxes		603	614	291
Income tax expense	Note 5	(178)	(177)	(103)
Net income		425	437	188
Less: Net income attributable to non-controlling interest		2	2	1
Net income attributable to controlling interest		\$ 423	\$ 435	\$ 187
Earnings per share - basic ¹⁾		\$ 4.86	\$ 4.97	\$ 2.14
Earnings per share - diluted ¹⁾		\$ 4.85	\$ 4.96	\$ 2.14
Weighted average number of shares outstanding, net of treasury shares (in millions)		87.1	87.5	87.3
Weighted average number of shares outstanding, assuming dilution and net of treasury shares (in millions)		87.2	87.7	87.5
Cash dividend per share - declared		\$ 2.58	\$ 1.88	\$ —
Cash dividend per share - paid		\$ 2.58	\$ 1.88	\$ 0.62

See Notes to the Consolidated Financial Statements.

1) Participating share awards with the right to receive dividend equivalents are (under the two class method) excluded from the earnings per share calculation (see Note 21 in this Annual Report).

Consolidated Statements of Comprehensive Income

(DOLLARS IN MILLIONS)	Years ended December 31		
	2022	2021	2020
Net income	\$ 425	\$ 437	\$ 188
<i>Other comprehensive (loss) income before tax:</i>			
Change in cumulative translation adjustments	(136)	(86)	97
Net change in unrealized components of defined benefit plans	29	37	8
Other comprehensive (loss) income, before tax	(108)	(49)	104
Tax effect allocated to other comprehensive (loss) income	(9)	(11)	(2)
Other comprehensive (loss) income, net of tax	(116)	(60)	103
Comprehensive income	309	377	291
Less: Comprehensive income attributable to non-controlling interest	0	2	2
Comprehensive income attributable to controlling interest	\$ 309	\$ 375	\$ 289

See Notes to the Consolidated Financial Statements.

Consolidated Balance Sheets

(DOLLARS AND SHARES IN MILLIONS)		At December 31	
		2022	2021
Assets			
Cash and cash equivalents		\$ 594	\$ 969
Receivables, net	Note 6	1,907	1,699
Inventories, net	Note 7	969	777
Income tax receivable		55	45
Prepaid expenses and accrued income		160	164
Related party receivable	Note 19	—	1
Other current assets	Note 12, 17	29	20
Total current assets		3,714	3,675
Property, plant and equipment, net	Note 9	1,960	1,855
Operating lease right-of-use assets	Note 3	160	132
Goodwill	Note 10	1,375	1,387
Intangible assets, net	Note 10	7	8
Other non-current assets	Note 8, 17	502	481
Total assets		7,717	7,537
Liabilities and equity			
Short-term debt	Note 13	711	346
Accounts payable		1,693	1,129
Accrued expenses	Notes 11, 12	915	987
Related party liabilities	Note 19	—	24
Income tax payable		75	81
Operating lease liabilities, current	Note 3	39	38
Other current liabilities		207	216
Total current liabilities		3,642	2,821
Long-term debt	Note 13	1,054	1,662
Pension liability	Note 18	154	197
Operating lease liabilities, non-current	Note 3	119	94
Other non-current liabilities		121	115
Total non-current liabilities		1,450	2,067
Commitments and contingencies	Note 17		
Common stock ¹⁾		91	103
Additional paid-in capital		1,113	1,329
Retained earnings		2,310	2,742
Accumulated other comprehensive loss	Note 14	(522)	(408)
Treasury stock (5.0 and 15.3 million shares, respectively)		(379)	(1,133)
Total controlling interest's equity		2,613	2,633
Non-controlling interest		13	15
Total equity		2,626	2,648
Total liabilities and equity		\$ 7,717	\$ 7,537

1) Number of shares: 350 million authorized for both years, 91.2 and 102.8 million issued, and 86.2 and 87.5 million outstanding, net of treasury shares, for 2022 and 2021, respectively.

See Notes to the Consolidated Financial Statements.

Consolidated Statements of Cash Flows

(DOLLARS IN MILLIONS)	Years ended December 31		
	2022	2021	2020
Operating activities			
Net income	\$ 425	\$ 437	\$ 188
<i>Adjustments to reconcile net income to cash provided by operating activities:</i>			
Depreciation and amortization	363	394	371
Gain on divestiture of property	(80)	—	—
Deferred income taxes	(40)	(20)	(24)
Undistributed earnings from equity method investments, net of dividends	(1)	(3)	0
Other, net	(13)	8	37
<i>Net change in operating working capital:</i>			
Receivables and other assets, gross	(297)	283	(415)
Inventories, gross	(243)	(19)	(34)
Accounts payable and accrued expenses	596	(314)	672
Income taxes	2	(12)	54
Net cash provided by operating activities	713	754	849
Investing activities			
Expenditures for property, plant and equipment	(585)	(458)	(344)
Proceeds from sale of property, plant and equipment	101	4	4
Net cash used in investing activities	(485)	(454)	(340)
Financing activities			
Repayment of short-term part of long-term debt	(302)	(275)	(235)
Net increase (decrease) in other short-term debt	167	(11)	(5)
Proceeds from long-term debt	—	—	1,177
Repayment of long-term debt	(55)	(20)	(723)
Dividends paid to non-controlling interest	(2)	(1)	(1)
Dividends paid	(224)	(165)	(54)
Stock repurchases	(115)	—	—
Common stock options exercised	0	3	1
Net cash (used in) provided by financing activities	(531)	(469)	160
Effect of exchange rate changes on cash and cash equivalents	(73)	(39)	64
(Decrease) increase in cash and cash equivalents	(375)	(209)	734
Cash and cash equivalents at beginning of year	969	1,178	445
Cash and cash equivalents at end of year	\$ 594	\$ 969	\$ 1,178

See Notes to the Consolidated Financial Statements.

Consolidated Statements of Total Equity

(DOLLARS AND SHARES IN MILLIONS)	Number of shares	Common stock	Additional paid in capital	Retained earnings	Accumulated other com- prehensive (loss) income ¹⁾	Treasury stock	Total parent shareholders' equity	Non- controlling interest	Total equity
Balance at December 31, 2019	103	\$ 103	\$ 1,329	\$ 2,284	\$ (449)	\$ (1,158)	\$ 2,109	\$ 13	\$ 2,122
Comprehensive Income:									
Net income				187			187	1	188
Foreign currency translation					96		96	1	97
Pension liability					6		6		6
Total Comprehensive Income							289	2	291
Stock-based compensation				1		10	11		11
Dividends paid to non-controlling interest on subsidiary shares								(1)	(1)
Balance at December 31, 2020	103	\$ 103	\$ 1,329	\$ 2,471	\$ (347)	\$ (1,147)	\$ 2,409	\$ 14	\$ 2,423
Comprehensive Income:									
Net income				435			435	2	437
Foreign currency translation					(87)		(87)	0	(86)
Pension liability					26		26		26
Total Comprehensive Income							375	2	377
Stock-based compensation						15	15		15
Cash dividends declared				(165)			(165)		(165)
Dividends paid to non-controlling interest on subsidiary shares								(1)	(1)
Balance at December 31, 2021	103	\$ 103	\$ 1,329	\$ 2,742	\$ (408)	\$ (1,133)	\$ 2,633	\$ 15	\$ 2,648
Comprehensive Income:									
Net income				423			423	2	425
Foreign currency translation					(134)		(134)	(1)	(136)
Pension liability					20		20		20
Total Comprehensive Income							309	0	309
Retired and repurchased shares	(11)	(11)	(216)	(631)		744	(115)		(115)
Stock-based compensation						10	10		10
Cash dividends declared				(224)			(224)		(224)
Dividends paid to non-controlling interest on subsidiary shares								(2)	(2)
Balance at December 31, 2022	91	\$ 91	\$ 1,113	\$ 2,310	\$ (522)	\$ (379)	\$ 2,613	\$ 13	\$ 2,626

1) See Note 14 for further details – includes tax effects where applicable.

See Notes to the Consolidated Financial Statements.

Notes to the Consolidated Financial Statements

(DOLLARS IN MILLIONS, EXCEPT PER SHARE DATA)

1. Basis of Presentation

NATURE OF OPERATIONS

Through its operating subsidiaries, the Company is a leading developer, manufacturer and supplier of passive safety systems to the automotive industry with a broad range of product offerings.

Passive safety systems are primarily meant to improve safety for occupants in a vehicle. Passive safety systems include modules and components for frontal-impact airbag protection systems, side-impact airbag protection systems, seatbelts, steering wheels and inflator technologies.

The Company also develops and manufactures mobility safety solutions such as pedestrian protection, battery cut-off switches, connected safety services, and safety solutions for riders of powered two wheelers.

PRINCIPLES OF CONSOLIDATION

The consolidated financial statements have been prepared in accordance with United States (U.S.) Generally Accepted Accounting Principles (GAAP) and include Autoliv, Inc. and all companies over which Autoliv, Inc. directly or indirectly exercises control, which as a general rule means that the Company owns more than 50% of the voting rights.

Consolidation is also required when the Company has both the power to direct the activities of a variable interest entity (VIE) and the obligation to absorb losses or the right to receive benefits from the VIE that could be significant to the VIE.

All intercompany accounts and transactions within the Company have been eliminated from the consolidated financial statements.

Investments in affiliated companies in which the Company exercises significant influence over the operations and financial policies, but does not control, are reported using the equity method of accounting. Generally, the Company owns between 20-50% of such investments.

SEGMENT REPORTING

In accordance with ASC 280, *Segment Reporting*, the operating segments are determined based on the information provided to the Chief Operating Decision Maker (CODM) on a regular basis and used for the purpose of assessing performance and allocating resources within the Company. The CEO is deemed to be the CODM of Autoliv since he is the person who makes all major decisions on how to allocate the resources and assess the performance of the Company for both strategic and operational initiatives.

ASC 280 indicates that a component is an operating segment if it meets the following criteria:

- It engages in business activities from which it may earn revenues and incur expenses.
- Its operating results are regularly reviewed by the CODM to make decisions about resources to be allocated to the segment and assess its performance.
- Its discrete financial information is available.

The Company as a whole has met the definition of an operating segment as it engages in business activities from which it may earn revenues and incur expenses, the consolidated operating results are regularly reviewed by the CEO/CODM to allocate resources and assess performance, and discrete financial information is available. Additionally, as Autoliv supplies customers on a global basis it also manages the business on a global basis. Therefore, based on the above analysis, the Company has concluded that the Company is the single operating and reportable segment under ASC 280, *Segment Reporting*. For more information on the Company's segment, see Note 20.

RECLASSIFICATIONS AND ROUNDINGS

Certain prior-year amounts have been reclassified to conform to current year presentation.

Certain amounts in the consolidated financial statements and associated notes may not reconcile due to rounding. All percentages have been calculated using unrounded amounts.

2. Summary of Significant Accounting Policies

EQUITY METHOD INVESTMENT

Investments accounted for under the equity method, means that a proportional share of the equity method investment's net income increases the investment, and a proportional share of losses and payment of dividends decreases it. In the Consolidated Statements of Income, the proportional share of the net income (loss) is reported as Income from equity method investment.

USE OF ESTIMATES

The preparation of consolidated financial statements in conformity with U.S. GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities, disclosures of contingent assets and liabilities at the date of the consolidated financial statements, and the reported amounts of net sales and expenses during the reporting period. The accounting estimates that require management's most significant judgments include the estimation of variable consideration for the Company's contracts with customers, valuation of stock-based compensation payments, assessment of recoverability of goodwill and intangible assets, estimation of pension benefit obligations based on actuarial assumptions, estimation of accruals for warranty and recalls, restructuring charges, uncertain tax positions, valuation allowances and legal proceedings. Actual results could differ from those estimates.

REVENUE RECOGNITION

In accordance with ASC 606, *Revenue from Contracts with Customers*, revenue is measured based on consideration specified in a contract with a customer, adjusted for any variable consideration (i.e. price concessions) and estimated at contract inception. The estimated amount of variable consideration that will be received by the Company is based on historical experience and trends, management's understanding of the status of negotiations with customers and anticipated future pricing strategies. The Company recognizes revenue when it satisfies a performance obligation by transferring control over a product to a customer.

In addition, from time to time, the Company may make payments to or receive additional consideration from customers in connection with ongoing and future business. These payments to or cash receipts from customers are generally recognized to revenue at the time of the commitment unless the payments to customers can be clearly linked to the future business. If the payments to customers are capitalized, the amounts are amortized to revenue as the related goods are transferred.

Taxes assessed by a governmental authority that are both imposed on and concurrent with a specific revenue-producing transaction and collected by the Company from a customer, are excluded from revenue.

Shipping and handling costs associated with outbound freight before control of a product has transferred to a customer are accounted for as a fulfillment cost and are included in cost of sales.

Nature of goods and services

The Company generates revenue from the sale of parts, which includes airbag and seatbelt products and components, to original equipment manufacturers ("OEMs").

The Company accounts for individual products separately if they are distinct (i.e., if a product is separately identifiable from other items and if a customer can benefit from it on its own or with other resources that are readily available to the customer). The consideration for each of the products, including any price concessions, is based on their stand-alone selling prices. The stand-alone selling prices are determined based on the cost-plus margin approach.

The Company recognizes revenue for parts primarily at a point in time. For parts with revenue recognized at a point in time, the Company recognizes revenue upon shipment to the customers and transfer of title and risk of loss under standard commercial terms (typically FOB shipping point).

There are certain contracts where the criteria to recognize revenue over time have been met (e.g., there is no alternative use to the Company and the Company has an enforceable right to payment). In such cases, at period end, the Company recognizes revenue and a related asset and associated cost of goods sold and reduction in inventory. However, the financial impact of these contracts is immaterial considering the very short production cycles and limited inventory days on hand. The contract balances with customers, included in other current assets, amounted to \$20 million as of December 31, 2022 and 2021.

The amount of revenue recognized is based on the purchase order price and adjusted for variable consideration (i.e. price concessions). Customers typically pay for the parts based on customary business practices.

GOVERNMENT ASSISTANCE

The Company's operations are impacted by various government incentives, grants, programs, rebates, and other arrangements. Government assistance received is recorded in our consolidated financial statements in accordance with their purpose, either as a reduction of expense or an offset to the related capital asset. The benefit is recorded when all performance obligations attached to the assistance have been met or are expected to be met and there is reasonable assurance of their receipt. Government assistance received by the Company is immaterial in all periods presented since the adoption of ASU 2021-10.

RESEARCH, DEVELOPMENT AND ENGINEERING, NET (R,D&E)

Research and development and most engineering expenses are expensed as incurred. These expenses are reported net of expense reimbursements from contracts to perform engineering design and product development fulfillment activities related to the production of parts. For the years 2022, 2021 and 2020 total reimbursements from customers were \$204 million, \$205 million and \$181 million, respectively.

Certain engineering expenses related to long-term supply arrangements are capitalized when defined criteria, such as the existence of a contractual guarantee for reimbursement, are met. The aggregate amount of such assets is not significant in any period presented.

Tooling is generally agreed upon as a separate contract or a separate component of an engineering contract, as a pre-production project. Capitalization of tooling costs is made only when the specific criteria for capitalization of customer funded tooling is met or the criteria for capitalization as Property, Plant & Equipment (P,P&E) for tools owned by the Company are fulfilled. Depreciation on the Company's own tooling is recognized in the Consolidated Statements of Income as Cost of sales.

STOCK-BASED COMPENSATION

The compensation costs for all of the Company's stock-based compensation awards are determined based on the fair value method as defined in ASC 718, *Compensation - Stock Compensation*. The Company records the compensation expense for awards under the Stock Incentive Plan, including Restricted Stock Units (RSUs), Performance Shares (PSUs) and stock options (SOs), over the respective vesting period. For further details, see Note 16.

INCOME TAXES

Current tax liabilities and assets are recognized for the estimated taxes payable or refundable on the tax returns for the current year. In certain circumstances, payments or refunds may extend beyond twelve months, in such cases amounts would be classified as non-current taxes payable or receivable. Deferred tax liabilities or assets are recognized for the estimated future tax effects attributable to temporary differences and carryforwards that result from events that have been recognized in either the financial statements or the tax returns, but not both. The measurement of current and deferred tax liabilities and assets is based on provisions of enacted tax laws. Deferred tax assets are reduced by the amount of any tax benefits that are not expected to be realized. A valuation allowance is recognized if, based on the weight of all available evidence, it is more likely than not that some portion, or all, of the deferred tax asset will not be realized. Evaluation of the realizability of deferred tax assets is subject to significant judgment requiring careful consideration of all facts and circumstances. The Company classifies deferred tax assets and liabilities as non-current in the Consolidated Balance Sheet. Tax assets and liabilities are not offset unless attributable to the same tax jurisdiction and netting is possible according to law and, as it relates to payables and receivables, expected to take place in the same period.

Tax benefits associated with tax positions taken in the Company's income tax returns are initially recognized when it is more likely than not that those tax positions will be sustained upon examination by the relevant taxing authorities. The Company's evaluation of its tax benefits is based on the probability of the tax position being upheld if challenged by the taxing authorities (including through negotiation, appeals, settlement and litigation). Whenever a tax position does not meet the initial recognition criteria, the tax benefit is subsequently recognized if there is a substantive change in the facts and circumstances that cause a change in judgment concerning the sustainability of the tax position upon examination by the relevant taxing authorities. In cases where tax benefits meet the initial recognition criterion, the Company continues, in subsequent periods, to assess its ability to sustain those positions. A previously recognized tax benefit is derecognized when it is no longer more likely than not that the tax position would be sustained upon examination. Liabilities for unrecognized tax benefits are classified as non-current unless the payment of the liability is expected to be made within the next 12 months.

EARNINGS PER SHARE

The Company calculates basic earnings per share (EPS) by dividing net income attributable to controlling interest by the weighted-average number of shares of common stock outstanding for the period (net of treasury shares). The Company's unvested RSUs and PSUs, of which some include the right to receive non-forfeitable dividend equivalents, are considered participating securities. The diluted EPS reflects the potential dilution that could occur if common stock was issued for awards under the Stock Incentive Plan and is calculated using the more dilutive method of either the two-class method or the treasury stock method. The treasury stock method assumes that the Company uses the proceeds from the exercise of stock option awards to repurchase ordinary shares at the average market price during the period. For unvested restricted stock, assumed proceeds under the treasury stock method will include unamortized compensation cost and windfall tax benefits or shortfalls. Post spin-off assumed proceeds under the treasury stock method related to RSUs will only include unamortized compensation cost related to Autoliv employees holding Autoliv RSUs. Calculations of EPS under the two-class method exclude from the numerator any dividends paid or owed on participating securities and any undistributed earnings considered to be attributable to participating securities. The related participating securities are similarly excluded from the denominator. For further details, see Notes 16 and 21.

CASH EQUIVALENTS

The Company considers all highly liquid investment instruments purchased with a maturity of three months or less to be cash equivalents.

RECEIVABLES AND ALLOWANCE FOR EXPECTED CREDIT LOSSES

In addition to individually assess overdue customer balances for expected credit losses, the Company also calculates an allowance that reflects the expected credit losses on receivables considering both historical experience as well as forward looking assumptions. The method calculates the expected credit loss for a group of customers by using the customer groups' average short-term default rates based on officially published credit ratings and the Company's historical experience. These default rates are considered the Company's best estimate of the customer's ability to pay. The Company regularly reassess the customer groups and the applied customer group's default rates by using its best judgement when considering changes in customer's credit ratings, customer's historical payments and loss experience, current market and economic conditions and the Company's expectations of future market and economic conditions.

There can be no assurance that the amount ultimately realized for receivables will not be materially different than that assumed in the calculation of the allowance for expected credit losses.

DERIVATIVE INSTRUMENTS AND HEDGING ACTIVITIES

All derivatives are recognized at fair value.

Hedge accounting is not applied either because non-hedge accounting treatment creates the same accounting result or the hedge does not meet the hedge accounting requirements, although entered into applying the same rationale concerning mitigating market risk that occurs from changes in interest and foreign exchange rates.

For further details on the Company's financial instruments, see Note 4.

INVENTORIES

The cost of inventories is computed according to the first-in first-out method (FIFO). Cost includes the cost of materials, direct labor and the applicable share of manufacturing overhead. Inventories are evaluated based on individual or, in some cases, groups of inventory items. Reserves are established to reduce the value of inventories to the lower of cost or net realizable value. Net realizable value is the estimated selling prices in the ordinary course of business, less reasonably predictable costs of completion, disposal and transportation. Excess inventories are quantities of items that exceed anticipated sales or usage for a reasonable period. The Company calculates provisions for excess inventories based on the number of months of inventories on hand compared to anticipated sales or usage. Management uses its judgment to forecast sales or usage and to determine what constitutes a reasonable period. There can be no assurance that the amount ultimately realized for inventories will not be materially different than that assumed in the calculation of the reserves.

PROPERTY, PLANT AND EQUIPMENT

Property, Plant and Equipment is recorded at historical cost. Construction in progress generally involves short-term projects for which capitalized interest is not significant. The Company provides for depreciation of property, plant and equipment computed under the straight-line method over the assets' estimated useful lives, or in the case of leasehold improvements over the shorter of the useful life or the lease term. Amortization on finance leases is recognized with depreciation expense in the Consolidated Statements of Income over the shorter of the assets' expected life or the lease contract term. Repairs and maintenance are expensed as incurred.

LEASES

In accordance with ASC 842, *Leases*, the Company recognizes contracts that is, or contains, a lease when the contract conveys the right to control the use of a physically identified asset for a period of time in exchange for consideration in the balance sheet as a right-of-use asset and lease liability. The Company recognizes a right-of-use asset and a lease liability at lease commencement. The lease liability for both finance and operating leases is measured at the present value of the remaining lease payments, discounted at the Company's incremental borrowing rate (if the implicit interest rate in the lease contract is not readily determinable). The right-of-use asset (ROU) for finance and operating leases is initially measured at the sum of the initial lease liability plus initial direct costs plus prepaid lease payments minus lease incentives received. Lease payments include undiscounted fixed payments plus optional payments that are reasonably certain to be owed. Lease payments do not include variable lease payments other than those that depend on an index or rate. Variable lease payments that depend on an index or a rate are included in the calculation of lease payments and in the measurement of the lease liability.

If the rate implicit in the lease is not readily determinable, the Company uses its incremental borrowing rate as the discount rate. The Company uses its best judgement when determining the incremental borrowing rate, which is the rate of interest that the Company would have to pay to borrow on a collateralized basis over a similar term to the lease payments in a similar currency.

The Company has elected the practical expedient of not separating lease components from non-lease components for all its classes of underlying assets. The Company has also elected to recognize the lease payments for short-term leases in its consolidated statement of income on a straight-line basis over the lease term and recognize the variable lease payments in the period in which the obligation for those payments is incurred.

Finance lease right-of-use assets are presented together with other property, plant and equipment assets and finance lease liabilities are presented together with other current and non-current liabilities in the Consolidated Balance Sheets. Finance leases were not material as of December 31, 2022.

For further details on the Company's leases, see Note 3.

LONG-LIVED ASSET IMPAIRMENT

The Company evaluates the carrying value and useful lives of long-lived assets, other than goodwill and intangible assets, when indications of impairment are evident or it is likely that the useful lives have decreased, in which case the Company depreciates the assets over the remaining useful lives. Impairment testing is primarily done by using the cash flow method based on undiscounted future cash flows. Estimated undiscounted cash flows for a long-lived asset being evaluated for recoverability are compared with the respective carrying amount of that asset. If the estimated undiscounted cash flows exceed the carrying amount of the assets, the carrying amounts of the long-lived asset are considered recoverable and an impairment cannot be recorded. However, if the carrying amount of a group of assets exceeds the undiscounted cash flows, an entity must then measure the long-lived assets' fair value to determine whether an impairment loss should be recognized, generally using a discounted cash flow model. Generally, the lowest level of cash flows for impairment assessment is customer platform level.

GOODWILL AND INTANGIBLE ASSETS

Goodwill represents the excess of the fair value of consideration transferred over the fair value of net assets of businesses acquired. Goodwill is not amortized but subject to at least an annual review for impairment. Other intangible assets, principally related to acquired technology, are amortized over their useful lives which range from 3 to 25 years.

The Company performs its annual impairment testing in the fourth quarter of each year. Impairment testing is required more often than annually if an event or circumstance indicates that an impairment, or decline in value, may have occurred. The Company uses either a qualitative assessment or a quantitative calculation for its impairment testing. The qualitative assessment permits the Company to assess whether it is more than likely than not (i.e. a likelihood of greater than 50%) that goodwill or an indefinite-lived intangible asset is impaired. If the Company concludes based on the qualitative assessment that it is not more likely than not that the fair value of goodwill or an indefinite-lived intangible asset is less than its carrying amount, it would not have to quantitatively determine the asset's fair value. The Company also consider external factors that could affect the significant inputs used to determine fair value.

In 2022, the Company performed a quantitative impairment test by calculating the fair value of its goodwill. The estimated fair market value of goodwill is determined by the discounted cash flow method. The Company discounts projected operating cash flows using its weighted average cost of capital. Estimating the fair value requires the Company to make judgments about appropriate discount rates, growth rates, relevant comparable company earnings multiples and the amount and timing of expected future cash flows. If the estimated fair value of a reporting unit exceeds its carrying value, goodwill is considered not to be impaired. If the carrying value of a reporting unit exceeds its estimated fair value, an impairment loss is recognized for the excess of carrying amount over the fair value of the respective reporting unit. To supplement this analysis, the Company compares the market value of its equity, calculated by reference to the quoted market prices of its shares, with the book value of its equity.

There were no impairments of goodwill from 2020 through 2022.

WARRANTIES AND RECALLS

The Company records liabilities for product recalls when probable claims are identified and when it is possible to reasonably estimate costs. Recall costs are costs incurred when the customer decides to formally recall a product due to a known or suspected safety concern. Product recall costs are estimated based on the expected cost of replacing the product and the customer's cost of carrying out the recall, which is affected by the number of vehicles subject to recall and the cost of labor and materials to remove and replace the defective product. Insurance receivables, related to recall issues covered by the insurance, are included within other current and non-current assets in the Consolidated Balance Sheets. Provisions for warranty claims are estimated based on prior experience, likely changes in performance of newer products and the mix and volume of products sold. The provisions are recorded on an accrual basis.

RESTRUCTURING PROVISIONS

The Company defines restructuring expense to include costs directly associated with rightsizing, exit or disposal activities. Estimates of restructuring charges are based on information available at the time such charges are recorded. In general, management anticipates that restructuring activities will be completed within a timeframe such that significant changes to the exit plan are not likely. Due to inherent uncertainty involved in estimating restructuring expenses, actual amounts paid for such activities may differ from amounts initially estimated.

PENSION OBLIGATIONS

The Company provides for both defined contribution plans and defined benefit plans. A defined contribution plan generally specifies the periodic amount that the employer must contribute to the plan and how that amount will be allocated to the eligible employees who perform services during the same period. A defined benefit pension plan is one that contains pension benefit formulas, which generally determine the amount of pension benefits that each employee will receive for services performed during a specified period of employment.

The amount recognized as a defined benefit liability is the net total of projected benefit obligation (PBO) minus the fair value of plan assets (if any) (see Note 18).

CONTINGENT LIABILITIES

Various claims, lawsuits and proceedings are pending or threatened against the Company or its subsidiaries, covering a range of matters that arise in the ordinary course of its business activities with respect to commercial, product liability or other matters (see Note 12). The Company diligently defends itself in such matters and, in addition, carries insurance coverage to the extent reasonably available against insurable risks. The Company records liabilities for claims, lawsuits and proceedings when they are probable and it is possible to reasonably estimate the cost of such liabilities. Legal costs expected to be incurred in connection with a loss contingency are expensed as such costs are incurred.

The Company believes, based on currently available information, that the resolution of outstanding matters, other than any antitrust related matters described in Note 17 after taking into account recorded liabilities and available insurance coverage, should not have a material effect on the Company's financial position or results of operations. However, due to the inherent uncertainty associated with such matters, there can be no assurance that the final outcomes of these matters will not be materially different than currently estimated.

TRANSLATION OF NON-U.S. SUBSIDIARIES

The balance sheets of subsidiaries with functional currency other than U.S. dollars are translated into U.S. dollars using year-end exchange rates. The Statements of Income of these subsidiaries is translated into U.S. dollars using monthly average exchange rates. Translation differences are reflected in equity as a component of OCI.

RECEIVABLES AND LIABILITIES IN NON-FUNCTIONAL CURRENCIES

Receivables and liabilities not denominated in functional currencies are converted at year-end exchange rates. Net transaction losses, reflected in the Consolidated Statements of Income, amounted to \$(25) million in 2022, \$(29) million in 2021 and \$(24) million in 2020, and are recorded in operating income if they relate to operational receivables and liabilities or are recorded in other non-operating items, net if they relate to financial receivables and liabilities.

NEW ACCOUNTING STANDARDS

Changes to U.S. GAAP are established by the Financial Accounting Standards Board ("FASB") in the form of accounting standards updates ("ASUs") to the FASB's Accounting Standards Codification (ASC). The Company considers the applicability and impact of all ASUs. ASUs not listed below were assessed and determined to be either not applicable or are expected to have an immaterial impact on the Company's consolidated financial statements.

Adoption of New Accounting Standards

In November 2021, the FASB issued ASU 2021-10, Government Assistance (Topic 832), Disclosures by Business Entities about Government Assistance, which increases the transparency of government assistance, including the disclosure of (1) the types of assistance, (2) an entity's accounting for the assistance, and (3) the effect of the assistance on an entity's financial statements. ASU 2021-10 is effective for business entities for annual periods beginning after December 15, 2021, and early adoption is permitted. The amendments in this update should be applied either (1) prospectively to all transactions within the scope of the amendments that are reflected in financial statements at the date of initial application and new transactions that are entered into after the date of initial application or (2) retrospectively to those transactions. The Company adopted this standard prospectively on January 1, 2022, and the adoption of this standard did not have a material impact on our Consolidated Financial Statements or related disclosures. For further information, see this Note 2 above.

Accounting Standards Issued But Not Yet Adopted

In September 2022, the FASB issued ASU 2022-04, Liabilities-Supplier Finance Programs (Subtopic 405-50), Disclosure of Supplier Finance Program Obligations, which requires that a buyer in a supplier finance program disclose sufficient information about the program to allow a user of financial statements to understand the program's nature, activity during the period, changes from period to period, and potential magnitude. To achieve that objective, the buyer should disclose qualitative and quantitative information about its supplier finance programs. The amendments in this update do not affect the recognition, measurement, or financial statement presentation of obligations covered by supplier finance programs. The amendments in this update are effective for fiscal years beginning after December 15, 2022, including interim periods within those fiscal years, except for the amendment on rollforward information, which is effective for fiscal years beginning after December 15, 2023, with early adoption permitted. During the fiscal year of adoption, the information on the key terms of the programs and the balance sheet presentation of the program obligations, which are annual disclosure requirements, should be disclosed in each interim period. The amendments in this update should be applied retrospectively to each period in which a balance sheet is presented, except for the amendment on rollforward information, which should be applied prospectively. The Company is currently assessing the impact that ASU 2022-04 will have on its consolidated financial statements and will adopt the amendments in this update upon the effective dates.

3. Leases

The Company has operating leases for offices, manufacturing and research buildings, machinery, cars, data processing and other equipment. The Company's leases have remaining lease terms of 1-45 years, some of which include options to extend the leases for up to 25 years, and some of which include options to terminate the leases within one year.

As of December 31, 2022, the Company has no additional material operating leases that have not yet commenced.

The following tables provide information about the Company's operating leases. The Company has not identified any material finance leases as of December 31, 2022; therefore, the finance lease cost components have not been disclosed in the tables below.

Lease cost

(Dollars in millions)

	Year ended December 31	
	2022	2021
Operating lease cost	\$ 50	\$ 44
Short-term lease cost	9	10
Variable lease cost	4	4
Sublease income	(1)	(2)
Total lease cost	\$ 62	\$ 57

Other information

(Dollars in millions)

	Year ended or as of December 31,	
	2022	2021
Cash paid for amounts included in the measurement of operating lease liabilities	\$ 42	\$ 46
Right-of-use assets obtained in exchange for new operating lease liabilities	74	41
Weighted-average remaining lease term - operating leases	9.7 years	6.7 years
Weighted-average discount rate - operating leases	2.8%	2.1%

Maturities of operating lease liabilities (undiscounted cash flows) are as follows:

(Dollars in millions)

	Maturities
2023	\$ 41
2024	27
2025	22
2026	16
2027	13
Thereafter	67
Total operating lease payments	186
Less imputed interest	(27)
Total operating lease liabilities	\$ 159

4. Fair Value Measurements

ASSETS AND LIABILITIES MEASURED AT FAIR VALUE ON A RECURRING BASIS

The carrying value of cash and cash equivalents, accounts receivable, accounts payable, other current liabilities and short-term debt approximate their fair value because of the short-term maturity of these instruments.

The Company uses derivative financial instruments, "derivatives", as part of its debt management to mitigate the market risk that occurs from its exposure to changes in interest and foreign exchange rates. The Company does not enter into derivatives for trading or other speculative purposes. The Company's use of derivatives is in accordance with the strategies contained in the Company's overall financial policy. All derivatives are recognized in the consolidated financial statements at fair value. Certain derivatives are from time to time designated either as fair value hedges or cash flow hedges in line with the hedge accounting criteria. For certain other derivatives hedge accounting is not applied either because non-hedge accounting treatment creates the same accounting result or the hedge does not meet the hedge accounting requirements, although entered into applying the same rationale concerning mitigating market risk that occurs from changes in interest and foreign exchange rates.

The degree of judgment utilized in measuring the fair value of the instruments generally correlates to the level of pricing observability. Pricing observability is impacted by several factors, including the type of asset or liability, whether the asset or liability has an established market and the characteristics specific to the transaction. Instruments with readily active quoted prices or for which fair value can be measured from actively quoted prices generally will have a higher degree of pricing observability and a lesser degree of judgment utilized in measuring fair value. Conversely, assets rarely traded or not quoted will generally have less, or no, pricing observability and a higher degree of judgment utilized in measuring fair value.

Under U.S. GAAP, there is a disclosure framework hierarchy associated with the level of pricing observability utilized in measuring assets and liabilities at fair value. The three broad levels defined by the hierarchy are as follows:

Level 1 - Quoted prices are available in active markets for identical assets or liabilities as of the reported date.

Level 2 - Pricing inputs are other than quoted prices in active markets, which are either directly or indirectly observable as of the reported date. The nature of these assets and liabilities include items for which quoted prices are available but traded less frequently, and items that are fair valued using other financial instruments, the parameters of which can be directly observed.

Level 3 - Assets and liabilities that have little to no pricing observability as of the reported date. These items do not have two-way markets and are measured using management's best estimate of fair value, where the inputs into the determination of fair value require significant management judgment or estimation.

The Company's derivatives are all classified as Level 2 of the fair value hierarchy.

The tables below present information about the Company's financial assets and liabilities measured at fair value on a recurring basis for the continuing operations as of December 31, 2022 and December 31, 2021. The carrying value is the same as the fair value as these instruments are recognized in the consolidated financial statements at fair value. Although the Company is party to close-out netting agreements (ISDA agreements) with all derivative counterparties, the fair values in the tables below and in the Consolidated Balance Sheets at December 31, 2022 and December 31, 2021 have been presented on a gross basis. According to the close-out netting agreements, transaction amounts payable to a counterparty on the same date and in the same currency can be netted. The amounts subject to netting agreements that the Company choose not to offset are presented below.

DERIVATIVES DESIGNATED AS HEDGING INSTRUMENTS

There were no derivatives designated as hedging instruments as of December 31, 2022 and December 31, 2021 related to the continuing operations.

DERIVATIVES NOT DESIGNATED AS HEDGING INSTRUMENTS

Derivatives not designated as hedging instruments, relate to economic hedges and are marked to market with all amounts recognized in the Consolidated Statements of Income. The derivatives not designated as hedging instruments outstanding at December 31, 2022 and December 31, 2021 were foreign exchange swaps.

For 2022, the Company recognized a gain of \$2 million in other non-operating items, net for derivative instruments not designated as hedging instruments. For 2021, the Company recognized a loss of \$33 million. For 2020, the Company recognized a gain of \$19 million. The realized part of the losses referred to above are reported under financing activities in the statement of cash flows. For 2022, 2021 and 2020, the gains and losses recognized as interest expense were immaterial.

	DECEMBER 31, 2022			DECEMBER 31, 2021		
	Nominal volume	Fair Value Measurements Derivative asset (Other current assets)	Derivative liability (Other current liabilities)	Nominal volume	Fair Value Measurements Derivative asset (Other current assets)	Derivative liability (Other current liabilities)
DERIVATIVES NOT DESIGNATED AS HEDGING INSTRUMENTS						
Foreign exchange swaps, less than 6 months	\$ 2,616 ¹⁾	\$ 22 ²⁾	\$ 15 ³⁾	\$ 1,348 ⁴⁾	\$ 5 ⁵⁾	\$ 16 ⁶⁾
TOTAL DERIVATIVES NOT DESIGNATED AS HEDGING INSTRUMENTS	\$ 2,616	\$ 22	\$ 15	\$ 1,348	\$ 5	\$ 16

1) Net nominal amount after deducting for offsetting swaps under ISDA agreements is \$2,616 million.

2) Net amount after deducting for offsetting swaps under ISDA agreements is \$22 million.

3) Net amount after deducting for offsetting swaps under ISDA agreements is \$15 million.

4) Net nominal amount after deducting for offsetting swaps under ISDA agreements is \$1,326 million.

5) Net amount after deducting for offsetting swaps under ISDA agreements is \$5 million.

6) Net amount after deducting for offsetting swaps under ISDA agreements is \$16 million.

FAIR VALUE OF DEBT

The fair value of long-term debt is determined either from quoted market prices as provided by participants in the secondary market or for long-term debt without quoted market prices, estimated using a discounted cash flow method based on the Company's current borrowing rates for similar types of financing. The fair value and carrying value of debt is summarized in the table below. The Company has determined that each of these fair value measurements of debt reside within Level 2 of the fair value hierarchy.

The fair value and carrying value of debt for the continuing operations are summarized in the table below (dollars in millions).

	DECEMBER 31, 2022		DECEMBER 31, 2021	
	CARRYING VALUE ¹⁾	FAIR VALUE	CARRYING VALUE ¹⁾	FAIR VALUE
LONG-TERM DEBT				
Bonds	\$ 767	\$ 735	\$ 1,330	\$ 1,400
Loans	287	292	332	347
TOTAL	\$ 1,054	\$ 1,027	\$ 1,662	\$ 1,747
SHORT-TERM DEBT				
Short-term portion of long-term debt	\$ 533	\$ 527	\$ 332	\$ 333
Overdrafts and other short-term debt	178	178	14	14
TOTAL	\$ 711	\$ 705	\$ 346	\$ 348

1) Debt as reported in balance sheet.

ASSETS AND LIABILITIES MEASURED AT FAIR VALUE ON A NON-RECURRING BASIS

In addition to assets and liabilities that are measured at fair value on a recurring basis, the Company also has assets and liabilities in its balance sheet that are measured at fair value on a nonrecurring basis including certain long-lived assets, including equity method investments, goodwill and other intangible assets, typically as it relates to impairment.

The Company has determined that the fair value measurements included in each of these assets and liabilities rely primarily on Company-specific inputs and the Company's assumptions about the use of the assets and settlements of liabilities, as observable inputs are not available. The Company has determined that each of these fair value measurements reside within Level 3 of the fair value hierarchy. To determine the fair value of long-lived assets as of the reporting date, the Company utilizes the projected cash flows expected to be generated by the long-lived assets, then discounts the future cash flows over the expected life of the long-lived assets.

For the period 2020-2022, the Company did not record any material impairment charges on its long-lived assets for its continuing operations.

5. Income Taxes

INCOME BEFORE INCOME TAXES (Dollars in millions)	2022	2021	2020
U.S.	\$ (3)	\$ (38)	\$ (102)
Non-U.S.	606	652	393
Total	\$ 603	\$ 614	\$ 291
PROVISION FOR INCOME TAXES (Dollars in millions)	2022	2021	2020
Current			
U.S. federal	\$ 32	\$ 8	\$ (41)
Non-U.S.	181	191	169
U.S. state and local	5	(2)	(2)
Deferred			
U.S. federal	(20)	(8)	(6)
Non-U.S.	(17)	(10)	(17)
U.S. state and local	(3)	(2)	(2)
Total income tax expense	\$ 178	\$ 177	\$ 103
EFFECTIVE INCOME TAX RATE (%)	2022	2021	2020
U.S. federal income tax rate	21.0 %	21.0 %	21.0 %
Non-Deductible Expenses	0.5	(0.1)	3.0
Foreign tax rate variances	3.6	3.1	8.4
Tax credits	(3.5)	(2.2)	(3.2)
Change in Valuation Allowances	(1.7)	(0.1)	7.1
Changes in tax reserves	(0.2)	0.6	1.7
Provision to Return	0.6	(0.2)	(8.8)
Earnings of equity investments	(0.1)	(0.1)	(0.2)
Withholding taxes	4.0	4.5	8.5
State taxes, net of federal benefit	0.4	(0.5)	(0.7)
Tax Audits	1.0	0.6	0.0
U.S. GILTI Tax	3.4	1.1	—
Impact of Translation Rates	0.2	—	—
Other, net	0.3	1.2	(1.5)
Effective income tax rate	29.5 %	28.9 %	35.3 %

Deferred income taxes reflect the net tax effects of temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes. On December 31, 2022, the Company had net operating loss carryforwards (NOL's) of approximately \$453 million, of which approximately \$373 million have no expiration date. The remaining losses expire on various dates through 2037. The Company also has \$25 million of U.S. Foreign Tax Credit carry forwards, which begin to expire in 2026.

Valuation allowances have been established which partially offset the related deferred assets. Such allowances are primarily provided against NOL's of companies that have perennially incurred losses, as well as the NOL's of companies that are start-up operations and have not established a pattern of profitability. The Company assesses all available evidence, both positive and negative, to determine the amount of any required valuation allowance. During 2022, the Company recognized a tax benefit of \$24 million due to the reversal of valuation allowances related to deferred tax assets for loss carryforwards and other deferred balances in Brazil, on the basis of management's reassessment of the amount of its deferred tax assets that are more likely than not to be realized.

On August 16, 2022, President Biden signed the Inflation Reduction Act of 2022 ("IRA") into law. The IRA contains a number of revisions to the Internal Revenue Code, including a 15% corporate alternative minimum income tax and a 1% excise tax on corporate stock repurchases in tax years beginning after December 31, 2022. While these tax law changes have no immediate effect and are not expected to have a material adverse effect on our results of operations going forward, we will continue to evaluate its impact as further information becomes available.

The foreign tax rate variance reflects the fact that approximately two-thirds of the Company's non-U.S. pre-tax income is generated by business operations located in tax jurisdictions where the tax rate is between 20-30%. The tax rate from quarter to quarter and from year to year is also impacted by the mix of earnings and tax rates in various jurisdictions compared to the same periods or prior years.

The Company has reserves for income taxes that may become payable in future periods as a result of tax audits. These reserves represent the Company's best estimate of the potential liability for tax exposures. Inherent uncertainties exist in estimates of tax exposures due to changes in tax law, both legislated and concluded through the various jurisdictions' court systems. The Company files income tax returns in the United States federal jurisdiction, and various states and non-U.S. jurisdictions.

At any given time, the Company is undergoing tax audits in several tax jurisdictions, covering multiple years. The Company is no longer subject to income tax examination by the U.S. Federal tax authorities for years prior to 2015. With few exceptions, the Company is no longer subject to income tax examination by U.S. state or local tax authorities or by non-U.S. tax authorities for years before 2011. The Company is undergoing tax audits in several non-U.S. jurisdictions and several U.S. state jurisdictions, covering multiple years. As of December 31, 2022, as a result of those tax examinations, the Company is not aware of any proposed income tax adjustments that would have a material impact on the Company's financial statements, however, other audits could result in additional increases or decreases to the unrecognized tax benefits in some future period or periods.

The Company recognizes interest and potential penalties accrued related to unrecognized tax benefits in tax expense. As of December 31, 2021, the Company had recorded \$49 million for unrecognized tax benefits related to prior years, including \$11 million of accrued interest and penalties. During 2022, the Company recorded a net decrease of \$4 million to income tax reserves for unrecognized tax benefits related to tax positions taken in prior years. Also during 2022, the Company recorded a net increase of \$7 million to income tax reserves for unrecognized tax benefits based on tax positions taken in the current year.

The Company had \$11 million accrued for the payment of interest and penalties as of December 31, 2022. Of the total unrecognized tax benefits of \$46 million recorded at December 31, 2022, \$5 million is classified as current income tax payable, and \$41 million is classified as non-current tax payable included in Other Non-Current Liabilities on the Consolidated Balance Sheets. Substantially all of these reserves would impact the effective tax rate if released into income. The following table summarizes the activity related to the Company's unrecognized tax benefits (dollars in millions):

UNRECOGNIZED TAX BENEFITS	2022	2021	2020
Unrecognized tax benefits at beginning of year	\$ 65	\$ 63	\$ 59
Increases as a result of tax positions taken during a prior period	0	3	1
Increases as a result of tax positions taken during the current period	7	5	4
Decreases as a result of tax positions taken during a prior period	0	0	0
Decreases relating to settlements with taxing authorities	(4)	(4)	0
Decreases resulting from the lapse of the applicable statute of limitations	0	(1)	(1)
Translation Difference	(1)	(1)	(0)
Total unrecognized tax benefits at end of year	\$ 67	\$ 65	\$ 63

The tax effect of temporary differences and carryforwards that comprise significant portions of deferred tax assets and liabilities were as follows (dollars in millions).

DEFERRED TAXES	December 31,		
	2022	2021	2020
Assets			
Provisions	\$ 99	\$ 136	\$ 141
Costs capitalized for tax	43	29	21
Property, plant and equipment	12	0	5
Retirement Plans	42	46	59
Tax receivables, principally NOL's	123	109	110
Deferred tax assets before allowances	319	320	336
Valuation allowances	(46)	(59)	(68)
Total	273	261	268
Liabilities			
Acquired intangibles	0	0	(2)
Statutory tax allowances	0	(6)	(0)
Distribution taxes	(3)	(6)	(15)
Other	(2)	(3)	(4)
Total	(5)	(15)	(21)
Net deferred tax asset	\$ 268	\$ 246	\$ 247

The following table summarizes the activity related to the Company's valuation allowances (dollars in millions):

VALUATION ALLOWANCES AGAINST DEFERRED TAX ASSETS	December 31,		
	2022	2021	2020
Allowances at beginning of year	\$ 59	\$ 68	\$ 61
Benefits reserved current year	14	5	14
Benefits recognized current year	(27)	(9)	(1)
Translation difference	0	(5)	(6)
Allowances at end of year	\$ 46	\$ 59	\$ 68

6. Receivables

(Dollars in millions)

	December 31,		
	2022	2021	2020
Receivables	\$ 1,916	\$ 1,707	\$ 1,831
Allowance for credit loss at beginning of year	(8)	(12)	(9)
Reversal of (addition to) allowance	(4)	(0)	(4)
Write-off against allowance	2	4	1
Translation difference	1	1	(1)
Allowance for credit loss at end of year	(9)	(8)	(12)
Total receivables, net of allowance	\$ 1,907	\$ 1,699	\$ 1,820

7. Inventories

(Dollars in millions)

	December 31,		
	2022	2021	2020
Raw material	\$ 445	\$ 395	\$ 379
Work in progress	350	283	292
Finished products	265	190	220
Inventories	1,060	868	891
Inventory reserve at beginning of year	(91)	(93)	(83)
Reversal of (addition to) reserve	(5)	(3)	(3)
Translation difference	4	5	(6)
Inventory reserve at end of year	(91)	(91)	(93)
Total inventories, net of reserve	\$ 969	\$ 777	\$ 798

8. Other Non-Current Assets

(Dollars in millions)

	December 31,	
	2022	2021
Equity method investments	\$ 12	\$ 11
Deferred tax assets	289	271
Income tax receivables	22	20
Insurance receivables	124	127
Other non-current assets	56	51
Total other non-current assets	\$ 502	\$ 481

As of December 31, 2022 and 2021, the Company had one equity method investment. The Company owns 49% of Autoliv-Hirota Safety Sdn, Bhd (parent and subsidiaries) in Malaysia which it currently does not control, but in which it exercises significant influence over operations and financial position.

9. Property, Plant and Equipment

(Dollars in millions)

	December 31,		Estimated life
	2022	2021	
Land and land improvements	\$ 125	\$ 147	n/a to 15
Buildings	957	957	20-40
Machinery and equipment	4,155	4,193	3-12
Construction in progress	523	354	n/a
Property, plant and equipment	5,760	5,651	
Less accumulated depreciation	(3,800)	(3,796)	
Net of depreciation	\$ 1,960	\$ 1,855	

DEPRECIATION INCLUDED IN	2022	2021	2020
Cost of sales	\$ 329	\$ 348	\$ 327
Selling, general and administrative expenses	11	13	13
Research, development and engineering expenses, net	20	23	21
Total	\$ 360	\$ 384	\$ 361

No significant fixed asset impairments related to the Company's operations were recognized during 2022, 2021 or 2020.

The net book value of machinery and equipment and buildings and land under finance lease contracts recorded at December 31, 2022 and December 31, 2021 were immaterial. The amortization expense related to finance leases is included with depreciation expenses disclosed in the table above.

10. Goodwill and Intangible Assets

GOODWILL (Dollars in millions)

	2022	2021
Carrying amount at beginning of year	\$ 1,387	\$ 1,398
Translation differences	(11)	(11)
Carrying amount at end of year	\$ 1,375	\$ 1,387

Approximately \$1.2 billion of the Company's goodwill is associated with the 1997 merger of Autoliv AB and the Automotive Safety Products Division of Morton International, Inc. No goodwill impairment charges were recognized during 2022, 2021 or 2020.

AMORTIZABLE INTANGIBLES (Dollars in millions)

	2022	2021
Gross carrying amount	\$ 387	\$ 398
Accumulated amortization	(380)	(390)
Carrying value	\$ 7	\$ 8

At December 31, 2022, intangible assets subject to amortization mainly relate to acquired technology. No significant impairments of intangible assets were recognized during 2022, 2021 or 2020.

Amortization expense related to intangible assets was \$3 million, \$10 million and \$10 million in 2022, 2021 and 2020, respectively. Estimated future amortization expense is: 2023: \$2 million; 2024: \$2 million; 2025: \$2 million; 2026: \$— million and 2027: \$— million.

11. Restructuring

Restructuring provisions are made on a case-by-case basis and primarily include severance costs incurred in connection with headcount reductions and plant consolidations. Restructuring costs other than employee related costs are immaterial for all periods presented and are included in the table below. The Company expects to finance restructuring programs over the next several years through cash generated from its ongoing operations or through cash available under its existing credit facilities. The Company does not expect that the execution of these programs will have an adverse impact on its liquidity position. The changes in the employee-related reserves have been charged against Other income (expense), net in the Consolidated Statements of Income. The restructuring reserve balance is included within Accrued expenses in the Consolidated Balance Sheet.

(Dollars in millions)	2022	2021	2020
Reserve at beginning of the period	\$ 88	\$ 126	\$ 56
Provision - charge	17	39	109
Provision - reversal	(4)	(31)	(10)
Cash payments	(64)	(37)	(38)
Translation difference	(5)	(8)	9
Reserve at end of the period	\$ 31	\$ 88	\$ 126

As of December 31, 2022, approximately \$10 million out of the \$31 million in total reserve balance can be attributed to footprint optimization activities in Europe, initiated in the third quarter of 2020 and expected to be concluded in 2023. The restructuring charges in 2022 of \$17 million, mainly related to footprint optimization activities in Asia and Europe. Cash payments of \$64 million in 2022 are mainly related to the structural efficiency program initiated in 2020, footprint optimization activities in Europe initiated in 2020 and in Asia initiated in 2022.

The restructuring charges in 2021 of \$39 million, mainly related to footprint optimization activities primarily in Asia. Reversals mainly related to the structural efficiency program initiated in the second quarter of 2020. Cash payments in 2021 related to the structural efficiency program initiated in the second quarter of 2020 and other footprint activities.

The restructuring charges in 2020 of \$109 million, mainly related to the structural efficiency program initiated in the second quarter of 2020 in the Americas and Europe, and footprint optimization activities in Europe initiated in the third quarter of 2020. Cash payments in 2020 mainly related to the structural efficiency program initiated in 2019.

12. Product Related Liabilities

Autoliv is exposed to product liability and warranty claims in the event that the Company's products fail to perform as represented and such failure results, or is alleged to result, in bodily injury, and/or property damage or other loss. The Company has reserves for product risks. Such reserves are related to product performance issues including recall, product liability and warranty issues. For further information, see Note 17.

The Company records liabilities for product related risks when probable claims are identified and when it is possible to reasonably estimate costs. Changes in reserve for warranty claims are estimated based on prior experience, likely changes in performance of newer products, and the mix and volume of the products sold. The changes in reserve are recorded on an accrual basis.

Pursuant to the Spin-off Agreements, Autoliv is also required to indemnify Veoneer, Inc. (which was acquired by SSW Partners on April 1, 2022) for recalls related to certain qualified Electronics products. At December 31, 2022, the reserves for indemnification liabilities were approximately \$4 million and were included within accrued expenses on the Consolidated Balance Sheet.

In 2022, the change in the reserve for product related liabilities mainly related to warranty related issues. Of the cash payments in 2022 the main part was also related to warranty related issues. In 2021, the cash payments mainly related to recall related issues, whereof the main part was related to the "Toyota Recall" recall issue. In 2020, the change in reserve mainly related to recall related issues, whereof the "Toyota Recall" represented the major recall issue. The reserve for product related liabilities is included in accrued expenses on the Consolidated Balance Sheet.

A majority of the Company's recall related issues as of December 31, 2022 are covered by insurance. Insurance receivables are included within other current and non-current assets on the Consolidated Balance Sheet. As of December 31, 2022, the Company had total insurance receivables related to recall issues of \$124 million (\$138 million as of December 31, 2021).

The table below summarizes the change in the balance sheet position of the product related liabilities (dollars in millions).

(Dollars in millions)	2022	2021	2020
Reserve at beginning of the year	\$ 144	\$ 341	\$ 72
Change in reserve	20	49	304
Cash payments	(17)	(245)	(36)
Translation difference	(2)	(1)	1
Reserve at end of the year	\$ 145	\$ 144	\$ 341

13. Debt and Credit Agreements

SHORT-TERM DEBT

As of December 31, 2022 and 2021, total short-term debt was \$711 million and \$346 million, respectively. As of December 31, 2022, short-term debt consisted mainly of a €500 million (\$533 million) 5-year notes in the Eurobond market issued in June 2018. The notes carry a coupon of 0.75% and are due June 2023.

The Company's subsidiaries have credit agreements, principally in the form of overdraft facilities with several local banks. Total available short-term facilities as of December 31, 2022, excluding commercial paper facilities as described below, amounted to \$349 million, of which approximately \$27 million was utilized. The weighted average interest rate on total short-term debt outstanding at December 31, 2022 and 2021, excluding the short-term portion of long-term debt, was 5% and 2%, respectively.

LONG-TERM DEBT

As of December 31, 2022 and 2021, total long-term debt was \$1,054 million and \$1,662 million, respectively.

In June 2020, the Company utilized its SEK 3,000 million facility with Swedish Export Credit Corporation which was signed in May 2020. The SEK 3,000 million (\$287 million) loan matures in 2025 and carries a floating interest rate of 3M STIBOR +1.85%.

In 2014, the Company issued long-term debt securities in a U.S. Private Placement. As of December 31, 2022 the total long-term debt outstanding from the 2014 issuance of \$767 million consist of: \$297 million aggregate principal amount of 10-year senior notes with an interest rate of 4.09%; \$285 million aggregate principal amount of 12-year senior notes with an interest rate of 4.24%; and \$185 million aggregate principal amount of 15-year senior notes with an interest rate of 4.44%.

CREDIT FACILITIES

In May 2022, the Company refinanced its existing revolving credit facility (RCF) of \$1,100 million. The facility, syndicated among 11 banks, matures in May 2027 and has two extension options, each for an additional year. The Company pays a commitment fee on the undrawn amount of 0.15%, representing 35% of the applicable margin, which is 0.425% (given the Company's rating of "BBB" from S&P Global Ratings). Borrowings under the facility are unsecured. As of December 31, 2022, the facility was not utilized.

The Company has a €3,000 million (\$3,199 million) Euro Medium Term Note Program in place for being able to issue notes to be traded on the Global Exchange Market of Euronext Dublin. At December 31, 2022, there were no notes outstanding that had been issued under this program.

The Company has two commercial paper programs: one SEK 7 billion (\$671 million) Swedish program and a \$1 billion U.S. program. At December 31, 2022 the total amount outstanding was SEK 100 million (\$10 million) and \$142 million under these two programs.

The Company is not subject to any financial covenants, i.e., performance related restrictions, in any of its significant long-term borrowings or commitments.

CREDIT RISK

In the Company's financial operations, credit risk arises in connection with cash deposits with banks and when entering into forward exchange agreements, swap contracts or other financial instruments. In order to reduce this risk, deposits and financial instruments are only entered with a limited number of banks up to a calculated risk amount of \$200 million per bank for banks rated A- or above and up to \$50 million for banks rated BBB+. The policy of the Company is to work with banks that have a strong credit rating and that participate in the Company's financing. In addition to this, deposits of up to an aggregate amount of \$2 billion can be placed in U.S. and Swedish government paper and in certain AAA rated money market funds. As of December 31, 2022, the Company had placed \$237 million in money market funds compared to \$579 million as of December 31, 2021.

The table below shows debt maturity as cash flow. For a description of hedging instruments used as part of debt management, see the Financial Instruments section of Note 2 and Note 4.

DEBT PROFILE

PRINCIPAL AMOUNT BY EXPECTED MATURITY (dollars in millions)

	2023	2024	2025	2026	2027	Thereafter	Total long-term	Total
Bonds	\$ 533	\$ 297	\$ —	\$ 285	\$ —	\$ 185	\$ 767	\$ 1,300
Loans	—	—	287	—	—	—	287	287
Commercial papers	152	—	—	—	—	—	—	152
Other short-term debt	27	—	—	—	—	—	—	27
Total principal amount	\$ 711	\$ 297	\$ 287	\$ 285	\$ —	\$ 185	\$ 1,054	\$ 1,765

14. Shareholders' Equity

The number of shares outstanding as of December 31, 2022 was 86,187,746.

DIVIDENDS	2022	2021	2020
Cash dividend paid per share	\$ 2.58	\$ 1.88	\$ 0.62
Cash dividend declared per share	\$ 2.58	\$ 1.88	\$ —

OTHER COMPREHENSIVE LOSS / ENDING BALANCE¹⁾ (Dollars in millions)	2022	2021	2020
Cumulative translation adjustments	\$ (492)	\$ (355)	\$ (269)
Net pension liability	(30)	(52)	(78)
Total (ending balance)	\$ (522)	\$ (408)	\$ (347)

Deferred taxes on the pension liability \$ 9 \$ 15 \$ 23

1) The components of Other Comprehensive Loss are net of any related income tax effects.

SHARE REPURCHASE PROGRAM

On December 31, 2021, the stock repurchase program authorized by the Board of Directors in 2014 expired with approximately 3 million shares remaining. In November 2021, the Board of Directors approved a new stock repurchase program that authorizes the Company to repurchase up to \$1.5 billion or up to 17 million shares (whichever comes first) between January 2022 and the end of 2024.

During 2022, the Company repurchased and immediately retired 1,440,572 shares for approximately \$115 million.

15. Supplemental Cash Flow Information

Payments for interest and income taxes were as follows:

(Dollars in millions)	2022	2021	2020
Interest	\$ 64	\$ 60	\$ 73
Income taxes	215	207	104

16. Stock Incentive Plan

The Company maintains the Autoliv, Inc. 1997 Stock Incentive Plan, as amended (the "Stock Incentive Plan"), pursuant to which it has granted to eligible employees and non-employee directors stock options (SOs), restricted stock units (RSUs) and performance shares (PSUs).

The fair value of the RSUs and PSUs is calculated as the grant date fair value of the shares expected to be issued. The RSUs and PSUs granted in 2022, 2021 and 2020 entitle the grantee to receive dividend equivalents in the form of additional RSUs and PSUs subject to the same vesting conditions as the underlying RSUs and PSUs. For the grants made during 2022, 2021 and 2020, the fair value of a RSU and a PSU was calculated by using the closing stock price on the grant date and, with respect to a PSU, assumed target performance. The grant date fair value for the RSUs and PSUs granted during 2022 was approximately \$5 million and approximately \$8 million, respectively.

Pursuant to the Company's non-employee director compensation policy effective May 1, 2022, the Company's non-employee directors receive an annual RSU grant having a grant date value equal to \$147,500 and the Chairman of the Board of Directors also receives an additional annual RSU grant having a grant date value equal to \$85,000. All RSUs granted to non-employee directors vest in one installment on the earlier of the next AGM or the first anniversary of the grant date, in each case subject to the grantee's continued service as a non-employee director on the vesting date with limited exceptions. The RSUs granted to the Company's non-employee directors entitle the grantee to receive dividend equivalents in the form of additional RSUs subject to the same vesting conditions as the underlying RSUs. The grant date fair value for the RSUs granted in 2022 to the Company's non-employee directors was approximately \$2 million.

The source of the shares issued upon vesting of awards is generally from treasury shares. The Stock Incentive Plan provides for the issuance of up to 9,585,055 common shares for awards. At December 31, 2022, 6,926,837 of these shares have been issued for awards and 2,658,218 shares remain available for future grants.

In 2015 and earlier, stock awards were granted in the form of SOs and RSUs. All SOs were granted for 10-year terms, had an exercise price equal to the fair market value per share of common stock at the date of grant, and became exercisable after one year of continued employment following the grant date. The average grant date fair values of SOs were calculated using the Black-Scholes valuation model. The Company used historical exercise data for determining the expected life assumption. Expected volatility was based on historical and implied volatility.

The Company recorded approximately \$4 million, \$10 million and \$12 million stock-based compensation expense related to RSUs and PSUs for 2022, 2021 and 2020, respectively. The total compensation cost related to non-vested awards not yet recognized is \$13 million for RSUs and PSs and the weighted average period over which this cost is expected to be recognized is approximately 1.7 years. There are no remaining unrecognized compensation costs associated with SOs.

Information on the number of RSUs, PSUs and SOs related to the Stock Incentive Plan during the period of 2020 to 2022 is as follows.

RSUs	2022	2021	2020
Weighted average fair value at grant date	\$ 87.56	\$ 94.01	\$ 69.58
Outstanding at beginning of year	218,268	244,901	255,195
Granted	85,985	81,866	115,500
Shares issued	(84,848)	(99,399)	(105,750)
Cancelled/Forfeited/Expired	(18,641)	(9,100)	(20,044)
Outstanding at end of year	200,764	218,268	244,901

The aggregate intrinsic value for RSUs outstanding at December 31, 2022 was approximately \$15 million.

PSUs	2022	2021	2020
Weighted average fair value at grant date	\$ 88.05	\$ 93.90	\$ 69.86
Outstanding at beginning of year	179,311	158,128	76,321
Change in performance conditions	(69,924)	(44,385)	23,998
Granted	82,914	74,427	75,940
Shares issued	(64,397)	—	—
Cancelled/Forfeited/Expired	(26,076)	(8,859)	(18,131)
Outstanding at end of year	101,828	179,311	158,128

The PSUs granted include assumptions regarding the ultimate number of shares that will be issued based on the probability of achievement of the performance conditions. Changes in those assumptions result in changes in the estimated shares to be issued which is reflected in the "Change in performance conditions" line above.

SOs	Number of options	Weighted average exercise price
Outstanding at December 31, 2019	115,875	\$ 66.70
Exercised	(14,238)	55.55
Spin conversion ¹⁾	(11,462)	69.25
Outstanding at December 31, 2020	90,175	68.13
Exercised	(40,112)	67.49
Cancelled/Forfeited/Expired	(188)	51.74
Outstanding at December 31, 2021	49,875	68.71
Exercised	(8,614)	59.28
Cancelled/Forfeited/Expired	(10,150)	70.40
Outstanding at December 31, 2022	31,111	70.77
OPTIONS EXERCISABLE		
At December 31, 2020	90,175	\$ 68.13
At December 31, 2021	49,875	68.71
At December 31, 2022	31,111	70.77

¹⁾ Reflects the cancellation of SOs outstanding as of the effective date of the Veoneer spin-off, and the conversion to new awards in accordance with the conversion factor (1.41). The weighted average exercise price reflects the exercise price of the shares cancelled due to the Veoneer spin-off.

The following summarizes information about SOs outstanding and exercisable at December 31, 2022:

EXERCISE PRICE	Number outstanding & exercisable	Remaining contract life (in years)	Weighted average exercise price
\$49.07	5,203	0.14	\$ 49.07
\$67.29	10,424	1.14	67.29
\$80.40	15,484	2.13	80.40
	31,111	1.46	70.77

The total aggregate intrinsic value, which is the difference between the exercise price and \$76.58 (closing price per share at December 31, 2022), for all “in the money” SOs, both outstanding and exercisable as of December 31, 2022, was immaterial.

17. Contingent Liabilities

LEGAL PROCEEDINGS

Various claims, lawsuits and proceedings are pending or threatened against the Company or its subsidiaries, covering a range of matters that arise in the ordinary course of its business activities with respect to commercial, product liability and other matters. Litigation is subject to many uncertainties, and the outcome of any litigation cannot be assured. After discussions with counsel, and with the exception of losses resulting from the antitrust proceedings described below, it is the opinion of management that the various legal proceedings and investigations to which the Company currently is a party will not have a material adverse impact on the consolidated financial position of Autoliv, but the Company cannot provide assurance that Autoliv will not experience material litigation, product liability or other losses in the future.

ANTITRUST MATTERS

Authorities in several jurisdictions have conducted broad, and in some cases, long-running investigations of suspected anti-competitive behavior among parts suppliers in the global automotive vehicle industry. These investigations included, but are not limited to, the products that the Company sells. In addition to concluded matters, authorities of other countries with significant light vehicle manufacturing or sales may initiate similar investigations.

PRODUCT WARRANTY, RECALLS AND INTELLECTUAL PROPERTY

Autoliv is exposed to various claims for damages and compensation if its products fail to perform as expected. Such claims can be made, and result in costs and other losses to the Company, even where the product is eventually found to have functioned properly. Where a product (actually or allegedly) fails to perform as expected or is defective, the Company may face warranty and recall claims. Where such (actual or alleged) failure or defect results, or is alleged to result, in bodily injury and/or property damage, the Company may also face product liability and other claims. There can be no assurance that the Company will not experience material warranty, recall or product (or other) liability claims or losses in the future, or that the Company will not incur significant costs to defend against such claims. The Company may be required to participate in a recall involving its products. Each vehicle manufacturer has its own practices regarding product recalls and other product liability actions relating to its suppliers. As suppliers become more integrally involved in the vehicle design process and assume more of the vehicle assembly functions, vehicle manufacturers are increasingly looking to their suppliers for contribution when faced with recalls and product liability claims. Government safety regulators may also play a role in warranty and recall practices. Recall decisions regarding the Company's products may require a significant amount of judgment by us, our customers and safety regulators and are influenced by a variety of factors. Once a recall has been made, the cost of a recall is also subject to a significant amount of judgment and discussions between the Company and its customers. A warranty, recall or product-liability claim brought against the Company in excess of its insurance may have a material adverse effect on the Company's business. Vehicle manufacturers are also increasingly requiring their outside suppliers to guarantee or warrant their products and bear the costs of repair and replacement of such products under new vehicle warranties. A vehicle manufacturer may attempt to hold the Company responsible for some, or all, of the repair or replacement costs of products when the product supplied did not perform as represented by us or expected by the customer in either a warranty or a recall situation. Accordingly, the future costs of warranty or recall claims by the customers may be material. However, the Company believes its established reserves are adequate. Autoliv's warranty reserves are based upon the Company's best estimates of amounts necessary to settle future and existing claims. The Company regularly evaluates the adequacy of these reserves, and adjusts them when appropriate. However, the final amounts actually due related to these matters could differ materially from the Company's recorded estimates.

In addition, as vehicle manufacturers increasingly use global platforms and procedures, quality performance evaluations are also conducted on a global basis. Any one or more quality, warranty or other recall issue(s) (including those affecting few units and/or having a small financial impact) may cause a vehicle manufacturer to implement measures such as a temporary or prolonged suspension of new orders, which may have a material impact on the Company's results of operations.

The Company maintains a program of insurance, which may include commercial insurance, self-insurance, or a combination of both approaches, for potential recall and product liability claims in amounts and on terms that it believes are reasonable and prudent based on our prior claims experience. The Company's insurance policies generally include coverage of the costs of a recall, although costs related to replacement parts are generally not covered. In addition, a number of the agreements entered into by the Company, including the Spin-off Agreements, require Autoliv to indemnify the other parties for certain claims. Autoliv cannot assure that the level of coverage will be sufficient to cover every possible claim that can arise in our businesses or with respect to other obligations, now or in the future, or that such coverage always will be available should we, now or in the future, wish to extend, increase or otherwise adjust our insurance.

As noted in Note 12 above, as of December 31, 2022, the Company has accrued \$145 million for total product related liabilities. The majority of the total product liability accrual as of December 31, 2022, relates to recalls, which are generally covered by insurance. Insurance receivables for such recall related liabilities total \$124 million as of December 31, 2022.

Product Liability:

On September 18, 2014, Jamie Andrews filed a wrongful death products liability suit against several Autoliv entities stemming from a fatal car accident in 2013 where the plaintiff's husband was fatally injured. The lawsuit alleges that Autoliv should be liable for a defectively-designed driver seatbelt. The case was removed to the United States District Court for the Northern District of Georgia. The suit originally included Bosch and Mazda entities as well, but these entities were dismissed pursuant to confidential settlement agreements with the plaintiff, and all of the Autoliv entities except Autoliv Japan Ltd. were also dismissed. On January 10, 2017, the District Court entered an order granting summary judgment in favor of Autoliv, concluding that Autoliv was not actively involved in the design of Mr. Andrews's seatbelt and, therefore, should not be liable for plaintiff's claims as a matter of law. However, on appeal, the Eleventh Circuit Court of Appeals reversed the decision, holding that, under Georgia's products liability statute, Autoliv could be liable for a design defect associated with the seatbelt, regardless of its level of involvement in the seatbelt's ultimate design, because Autoliv manufactured it. On October 4, 2021, the case proceeded to a bench trial before the United States District Court for the Northern District of Georgia. On December 31, 2021, the District Court entered a Final Order and Judgment concluding that Mr. Andrews's seatbelt was defectively designed and Autoliv was strictly liable for the design. In doing so, the District Court concluded that Mr. Andrews had incurred \$27,019,343 in compensatory damages, but only ordered Autoliv to pay 50 percent of that amount, \$13,509,671 after finding that 50 percent of the fault for Mr. Andrews's damages should be apportioned to Mazda. The Court declined to apportion any fault for Mr. Andrews's damages to Mr. Andrews or Bosch. The District Court also entered an award of punitive damages against Autoliv in the amount of \$100,000,000. Subsequently, on September 30, 2022, the District Court awarded pre-judgment interest on the compensatory damages award of approximately \$4,734,350.

The Company believes the District Court's verdict was in error, including the grossly high punitive damages award, and appealed the verdict.

The Company has determined that a loss with respect to this litigation is probable and has in the fourth quarter of 2021 accrued \$14 million pursuant to ASC 450. The Company accrued an additional \$5 million for the pre-judgment interest in the third quarter of 2022. The accrual is reflected in the total product liability accrual. This amount reflects the low end of the range of a probable loss of \$18 million to \$118 million. The accrual reflects the Company's best estimate of the probable loss based on currently available information and does not include any amount for the punitive damages. It is reasonably possible that the Company may have to pay the entire damages awarded by the District Court. The Company believes that its insurance should cover all of the types of damages awarded by the District Court, and has therefore recognized a receivable, included within Other non-current assets on the Consolidated Balance Sheet at December 31, 2021, for the expected insurance proceeds. However, the extent of the Company's insurance coverage for punitive damages in this matter is uncertain and may be less than all of such punitive damages ultimately awarded. In the event all or a portion of the punitive damages award survives the Company's appeal, the Company will continue to engage with our insurance carriers and aggressively pursue all potential recoveries. The ultimate loss to the Company of the litigation matter could be materially different from the amount the Company has accrued. The Company cannot predict or estimate the duration or ultimate outcome of this matter.

Specific Recalls:

In the fourth quarter of 2020, the Company was made aware of a potential recall by one of its customers (the "Unannounced Recall"). The Company continues to evaluate this matter with its customer. The Company determined pursuant to ASC 450 that a loss with respect to the Unannounced Recall is probable and accrued an amount that is reflected in the total product liability accrual in the fourth quarter of 2020 and increased the accrual in the fourth quarter of 2021. The amount by which the product liability accrual exceeds the product liability insurance receivable with respect to the Unannounced Recall is \$27 million and includes self-insurance retention costs and deductibles. The ultimate loss to the Company of the Unannounced Recall could be materially different from the amount the Company has accrued.

Volvo Car USA, LLC (together with its affiliates, "Volvo") has recalled approximately 762,000 vehicles relating to the malfunction of inflators produced by ZF (the "ZF Inflator Recall"). The recalled ZF inflators were included in airbag modules supplied by the Company only to Volvo. The recall commenced in November 2020 and later expanded in September 2021. Because the Company's airbags were involved with the ZF Inflator Recall, the Company has determined pursuant to ASC 450 that a loss is reasonably possible with respect to the ZF Inflator Recall. The Company continues to evaluate this matter with Volvo and ZF and no accrual has been made. Although the Company currently estimates a range of \$0 to \$43 million with respect to this potential loss, the Company anticipates that any losses net of insurance claims and claims against ZF will be immaterial.

Intellectual property:

In its products, the Company utilizes technologies which may be subject to intellectual property rights of third parties. While the Company does seek to procure the necessary rights to utilize intellectual property rights associated with its products, it may fail to do so. Where the Company so fails, the Company may be exposed to material claims from the owners of such rights. Where the Company has sold products which infringe upon such rights, its customers may be entitled to be indemnified by the Company for the claims they suffer as a result thereof. Such claims could be material.

The table in Note 12 above summarizes the change in the balance sheet position of the product related liabilities for the fiscal year ended December 31, 2022.

18. Retirement Plans

DEFINED CONTRIBUTION PLANS

Many of the Company's employees are covered by government sponsored pension and welfare programs. Under the terms of these programs, the Company makes periodic payments to various government agencies. In addition, in some countries the Company sponsors or participates in certain non-governmental defined contribution plans. Contributions to defined contribution plans for the years ended December 31, 2022, 2021 and 2020 were \$29 million, \$18 million and \$15 million, respectively.

MULTIEMPLOYER PLANS

The Company participates in a multiemployer plan in Sweden. This ITP-2 plan is funded through Alecta and covers employees born before 1979, for whom it provides a final pay pension benefit based on all service with participating employers. The Company must pay for wage increases in excess of inflation on service earned with previous employers. The plan also provides disability and family benefits and is more than 100% funded. The Company's contributions to this multiemployer plan for the years ended December 31, 2022, 2021 and 2020 were \$6 million, \$5 million and \$4 million, respectively.

DEFINED BENEFIT PLANS

The Company has a number of defined benefit pension plans, both contributory and non-contributory, in the U.S., France, Germany, India, Japan, Mexico, Philippines, Poland, Sweden, South Korea, Thailand, Turkey and the United Kingdom. There are funded as well as unfunded plan arrangements which provide retirement benefits to both U.S. and non-U.S. participants.

The main plan is the U.S. plan for which the benefits are based on an average of the employee's earnings in the years preceding retirement and on credited service. In a prior year, the Company closed participation in the Autoliv ASP, Inc. Pension Plan to exclude those employees hired after December 31, 2003. Within the U.S. there is also a non-qualified restoration plan that provides benefits to employees whose benefits in the primary U.S. plan are restricted by limitations on the compensation that can be considered in calculating their benefits. During December 2017 the Company amended the U.S. defined benefit pension plan, communicating a benefits freeze that will begin on December 31, 2021. Settlement accounting has been recognized each quarter in 2022 for the U.S. plans because the lump-sum payments made to plan participants during 2022 exceeded the sum of service cost and interest cost.

For the Company's non-U.S. defined benefit plans the most significant individual plan is in the U.K. The Company has closed participation in the U.K. defined benefit plan to exclude all employees hired after April 30, 2003 with few members currently accruing benefits.

CHANGES IN BENEFIT OBLIGATIONS AND PLAN ASSETS FOR THE YEARS ENDED DECEMBER 31

(Dollars in millions)	U.S.		Non-U.S.	
	2022	2021	2022	2021
Benefit obligation at beginning of year	\$ 381	\$ 426	\$ 260	\$ 279
Service cost	—	8	9	12
Interest cost	12	10	6	5
Actuarial (gain) loss due to:				
Change in discount rate	(111)	(17)	(65)	(22)
Experience	15	3	4	9
Other assumption changes	—	3	18	4
Benefits paid	(4)	(4)	(20)	(8)
Plan settlements/curtailments	(66)	(48)	(3)	(2)
Plan amendments	—	—	2	—
Other	—	—	—	(0)
Translation difference	—	—	(19)	(16)
Benefit obligation at end of year	\$ 227	\$ 381	\$ 192	\$ 260
Fair value of plan assets at beginning of year	\$ 343	\$ 355	\$ 101	\$ 103
Actual return on plan assets	(75)	25	(27)	1
Company contributions	3	15	19	11
Benefits paid	(4)	(4)	(20)	(8)
Plan settlements	(66)	(48)	—	(2)
Translation difference	—	—	(10)	(2)
Fair value of plan assets at end of year	\$ 201	\$ 343	\$ 63	\$ 101
Pension liability recognized in the balance sheet	\$ 26	\$ 38	\$ 128	\$ 159

The U.S. plan provides that benefits may be paid in the form of a lump sum if so elected by the participant. In order to more accurately reflect a market-derived pension obligation, Autoliv adjusts the assumed lump sum interest rate to reflect market conditions as of each December 31. This methodology is consistent with the approach required under the Pension Protection Act of 2006, which provides the rules for determining minimum funding requirements in the U.S.

COMPONENTS OF NET PERIODIC BENEFIT COST ASSOCIATED WITH THE DEFINED BENEFIT RETIREMENT PLANS FOR THE YEARS ENDED DECEMBER 31

(Dollars in millions)	U.S.		
	2022	2021	2020
Service cost	\$ —	\$ 8	\$ 8
Interest cost	12	10	12
Expected return on plan assets	(14)	(18)	(16)
Amortization of actuarial loss	0	2	3
Settlement loss	6	5	7
Net periodic benefit cost	\$ 4	\$ 7	\$ 13

(Dollars in millions)	Non-U.S.		
	2022	2021	2020
Service cost	\$ 9	\$ 12	\$ 12
Interest cost	6	5	6
Expected return on plan assets	(2)	(2)	(2)
Amortization of prior service costs	1	0	0
Amortization of actuarial loss	1	1	2
Settlement/curtailment (gain) loss	(8)	0	0
Net periodic benefit cost	\$ 7	\$ 17	\$ 19

The service cost and amortization of prior service cost components are reported among other employee compensation costs in the Consolidated Statements of Income. The remaining components, interest cost, expected returns on plan assets and amortization of actuarial loss, are reported as Other non-operating items, net in the Consolidated Statements of Income.

Amortization of the net actuarial loss from accumulated other comprehensive income is made over the estimated average remaining lifetime of the plan participants (28 to 32 years) for the U.S. plans, and the estimated average remaining service lives or lifetimes of the plan participants for the non-U.S. plans, the periods varying over a wide range between the different countries depending on the age of the population concerned.

COMPONENTS OF ACCUMULATED OTHER COMPREHENSIVE LOSS BEFORE TAX AS OF DECEMBER 31

(Dollars in millions)	U.S.		Non-U.S.	
	2022	2021	2022	2021
Net actuarial loss	\$ 22	\$ 35	\$ 18	\$ 30
Prior service cost	—	—	4	3
Total accumulated other comprehensive loss recognized in the balance sheet	\$ 22	\$ 35	\$ 22	\$ 33

CHANGES IN ACCUMULATED OTHER COMPREHENSIVE LOSS BEFORE TAX FOR THE YEARS ENDED DECEMBER 31

(Dollars in millions)	U.S.		Non-U.S.	
	2022	2021	2022	2021
Total retirement benefit recognized in accumulated other comprehensive loss at beginning of year	\$ 35	\$ 62	\$ 33	\$ 45
Net actuarial loss (gain)	(7)	(19)	(15)	(8)
Amortization or curtailment recognition of prior service credit (cost)	—	—	1	(0)
Amortization or settlement recognition of net gain (loss)	(6)	(7)	5	(2)
Translation difference	—	—	(2)	(2)
Total retirement benefit recognized in accumulated other comprehensive loss at end of year	\$ 22	\$ 35	\$ 22	\$ 33

The accumulated benefit obligation for the U.S. non-contributory defined benefit pension plans was \$227 million and \$381 million at December 31, 2022 and 2021, respectively. The accumulated benefit obligation for the non-U.S. defined benefit pension plans was \$154 million and \$223 million at December 31, 2022 and 2021, respectively.

Pension plans for which the accumulated benefit obligation (ABO) is notably in excess of the plan assets reside in the following countries: U.S., Mexico, France, Germany, Japan, South Korea, Sweden, Thailand and Turkey.

PENSION PLANS FOR WHICH ABO EXCEEDS THE FAIR VALUE OF PLAN ASSETS AS OF DECEMBER 31

(Dollars in millions)	U.S.		Non-U.S.	
	2022	2021	2022	2021
Projected Benefit Obligation (PBO)	\$ 227	\$ 381	\$ 134	\$ 164
Accumulated Benefit Obligation (ABO)	227	381	102	132
Fair value of plan assets	201	343	2	4

The Company, in consultation with its actuarial advisors, determines certain key assumptions to be used in calculating the projected benefit obligation and annual net periodic benefit cost.

ASSUMPTIONS USED TO DETERMINE THE BENEFIT OBLIGATIONS AS OF DECEMBER 31

(% Weighted average / % Range)	U.S.		Non-U.S. ¹⁾	
	2022	2021	2022	2021
Discount rate	5.41	2.77	0.75-5.40	0.25-3.20
Rate of increases in compensation level	n/a	n/a	2.00-5.00	1.80-4.00

ASSUMPTIONS USED TO DETERMINE THE NET PERIODIC BENEFIT COST FOR THE YEARS ENDED DECEMBER 31

(% Weighted average)	U.S.		
	2022	2021	2020
Discount rate	2.77	2.37	3.25
Rate of increases in compensation level	n/a	2.65	2.65
Expected long-term rate of return on assets	5.05	5.05	5.05

(% Range)	Non-U.S. ¹⁾		
	2022	2021	2020
Discount rate	0.25-3.20	0.25-2.70	0.25-2.70
Rate of increases in compensation level	1.80-4.00	1.80-4.00	2.00-5.00
Expected long-term rate of return on assets	1.70-2.20	1.40-2.25	1.50-2.25

1) The Non-U.S. weighted average plan ranges in the tables above represent significant plans only.

The discount rate for the U.S. plans has been set based on the rates of return on high-quality fixed-income investments currently available at the measurement date and expected to be available during the period the benefits will be paid. The expected timing of cash flows from the plan has also been considered in selecting the discount rate. In particular, the yields on bonds rated AA or better on the measurement date have been used to set the discount rate. The discount rate for the U.K. plan has been set based on the weighted average yields on long-term high-grade corporate bonds and is determined by reference to financial markets on the measurement date.

The expected rate of increase in compensation levels and long-term rate of return on plan assets are determined based on a number of factors and must take into account long-term expectations and reflect the financial environment in the respective local market. The expected return on assets for the U.S. and U.K. plans are based on the fair value of the assets as of December 31.

The level of equity exposure is currently targeted at approximately 40% for the primary U.S. plan. The investment objective is to provide an attractive risk-adjusted return that will ensure the payment of benefits while protecting against the risk of substantial investment losses. Correlations among the asset classes are used to identify an asset mix that Autoliv believes will provide the most attractive returns. Long-term return forecasts for each asset class using historical data and other qualitative considerations to adjust for projected economic forecasts are used to set the expected rate of return for the entire portfolio. The Company has assumed a long-term rate of return on the U.S. plan assets of 5.05% for calculating the 2022 expense and 5.05% for calculating the 2023 expense.

The Company has assumed a long-term rate of return on the non-U.S. plan assets in a range of 1.70-2.20% for 2022. The closed U.K. plan, which has a targeted and actual allocation of almost 100% debt instruments, accounts for approximately 74% of the total non-U.S. plan assets.

Autoliv made contributions to the U.S. plan during 2022 and 2021 amounting to \$3 million and \$15 million, respectively. Contributions to the U.K. plan during 2022 and 2021 amounted to \$2 million and \$2 million, respectively. The Company expects to contribute \$1 million to its U.S. pension plan in 2023 and is currently projecting a yearly funding at the same level in the years thereafter. For the UK pension plan, which is the most significant non-U.S. pension plan, the Company expects to contribute \$2 million in 2023 and in the years thereafter.

FAIR VALUE OF TOTAL PLAN ASSETS FOR THE YEARS ENDED DECEMBER 31

ASSETS CATEGORY (% Weighted average)	U.S.	U.S.		Non-U.S.	
	Target allocation	2022	2021	2022	2021
Equity securities %	40	23	42	0	0
Debt instruments %	60	76	57	60	76
Other assets %	—	1	1	40	24
Total %	100	100	100	100	100

The following table summarizes the fair value of the Company's U.S. and non-U.S. defined benefit pension plan assets:

(Dollars in millions)	Fair value measurement at December 31,	
	2022	2021
Assets		
Non-U.S. Bonds		
Corporate	\$ 38	\$ 77
Insurance Contracts	14	16
Other Investments	11	8
Assets at fair value Level 2	63	101
Investments measured at net asset value (NAV):		
Common collective trusts	201	343
Total	\$ 264	\$ 444

The fair value measurement level within the fair value hierarchy is based on the lowest level of any input that is significant to the fair value measurement. Certain assets that are measured at fair value using the NAV per share (or its equivalent) practical expedient have not been classified in the fair value hierarchy. Plan assets not measured using the NAV are classified as Level 2 in the table above. Plan assets measured using the NAV mainly relate to the U.S. defined benefit pension plans and are separately disclosed as Common collective trusts below the Level 2 assets in the table above.

The estimated future benefit payments for the pension benefits reflect expected future service, as appropriate. The amount of benefit payments in a given year may vary from the projected amount, especially for the U.S. plan since historically this plan pays the majority of benefits as a lump sum, where the lump sum amounts vary with market interest rates.

PENSION BENEFITS EXPECTED PAYMENTS (dollars in millions)	U.S.	Non-U.S.
2023	\$ 14	\$ 10
2024	16	11
2025	17	11
2026	19	11
2027	19	12
Years 2028-2032	94	74

POSTRETIREMENT BENEFITS OTHER THAN PENSIONS

The Company currently provides postretirement health care and life insurance benefits to a limited group of U.S. retirees.

In general, the terms of the plans provide that U.S. employees who retire after attaining age 55, with 15 years of service (5 years before December 31, 2006), are reimbursed for qualified medical expenses up to a maximum annual amount. Spouses for certain retirees are also eligible for reimbursement under the plan. Life insurance coverage is available for those who elect coverage under the retiree health plan. During 2014, the plan was amended to move from a self-insured model where employees were charged an estimated premium based on anticipated plan expenses for continued coverage, to a plan where retirees are provided a fixed contribution to a Health Retirement Account (HRA). Retirees can use the HRA funds to purchase insurance through a private exchange. Employees hired on or after January 1, 2004 are not eligible to participate in the plan.

As of December 31, 2022 and 2021, the benefit obligation for postretirement benefit plans other than pensions were \$15 million and \$21 million, respectively. The liability for postretirement benefits other than pensions is classified as other non-current liabilities in the balance sheet. The components of the net periodic benefit costs associated with these plans were immaterial for the years 2022, 2021 and 2020.

The average discount rate used to determine the U.S. postretirement benefit obligation was 5.39% in 2022 and 2.91% in 2021. The average discount rate used in determining the postretirement benefit cost was 2.91% in 2022, 2.60% in 2021 and 3.50% in 2020.

The accumulated other comprehensive income before tax associated with the postretirement benefit plans other than pensions recognized in the balance sheet as of December 31, 2022 and 2021 were \$7 million and \$3 million, respectively. The components of the accumulated other comprehensive income were immaterial for the years 2022 and 2021.

The estimated future benefit payments for the postretirement benefits, which reflect expected future service as appropriate, are expected to be immaterial for all the future years 2023-2032.

19. Related Party Transactions

Veoneer, Inc., was a related party until April 1, 2022. During the three months period ended March 31, 2022, when Veoneer was a related party, the Company's related party purchases from Veoneer amounted to \$17 million. The related party purchases for the full year 2021 amounted to \$69 million.

Amounts due to and due from related parties as of December 31, 2021 are summarized in the below table:

<i>(Dollars in millions)</i>	As of December 31, 2021
Related party receivables	\$ 1
Related party payables ¹⁾	15
Related party accrued expenses ¹⁾	9

1) Included in Related party liabilities in the Consolidated Balance Sheet.

20. Segment Information

The Company has one operating segment which includes Autoliv's airbag and seatbelt products and components. The operating results of the operating segment are regularly reviewed by the Company's chief operating decision maker to assess the performance of the operating segment and make decisions about resources to be allocated to the operating segment.

The Company's customers consist of all major European, U.S. and Asian automobile manufacturers. Sales to individual customers representing 10% or more of net sales were:

In 2022: Renault 11% (including Nissan and Mitsubishi), Stellantis 11% and VW 10%.

In 2021: Renault 13% (including Nissan and Mitsubishi), Stellantis 11% and VW 10%.

In 2020: Renault 13% (including Nissan and Mitsubishi) and VW 11% and Honda 10%.

NET SALES BY REGION (Dollars in millions)	2022	2021	2020
China	\$ 1,883	\$ 1,766	\$ 1,541
Japan	686	733	733
Rest of Asia	952	908	769
Americas	2,967	2,535	2,337
Europe	2,355	2,289	2,067
Total	\$ 8,842	\$ 8,230	\$ 7,447

The Company has attributed net sales to the geographic area based on the location of the entity selling the final product.

External sales in the U.S. amounted to \$2,029 million, \$1,724 million and \$1,647 million in 2022, 2021 and 2020, respectively. Of the external sales, exports from the U.S. to other regions amounted to approximately \$298 million, \$280 million and \$348 million in 2022, 2021 and 2020, respectively.

NET SALES BY PRODUCT (Dollars in millions)	2022	2021	2020
Airbag, Steering Wheels and Other ¹⁾	\$ 5,807	\$ 5,380	\$ 4,824
Seatbelt Products ¹⁾	3,035	2,850	2,623
Total net sales	\$ 8,842	\$ 8,230	\$ 7,447

1) Including Corporate and other sales.

LONG-LIVED ASSETS (Dollars in millions)	2022	2021
China	\$ 581	\$ 521
Japan	134	178
Rest of Asia	283	293
Americas	1,962	1,838
Europe	1,043	1,032
Total	\$ 4,003	\$ 3,862

Long-lived assets in the U.S. amounted to \$1,626 million and \$1,604 million for 2022 and 2021, respectively. For 2022 and 2021, \$1,226 million and \$1,227 million, respectively, of the long-lived assets in the U.S. refers to intangible assets, principally from acquisition goodwill.

21. Earnings Per Share

The computation of basic and diluted EPS under the two-class method were as follows (dollars and shares in millions):

	2022	2021	2020
Numerator: ¹⁾			
Net income attributable to common shareholders	\$ 423	\$ 435	\$ 187
Denominator: ¹⁾			
Basic weighted average common stock	87.1	87.5	87.3
Added: Weighted average stock options/share awards	0.2	0.2	0.2
Diluted weighted average common stock	87.2	87.7	87.5
Basic EPS	\$ 4.86	\$ 4.97	\$ 2.14
Diluted EPS	\$ 4.85	\$ 4.96	\$ 2.14

1) The Company's unvested RSUs and PSs, of which some included the right to receive non-forfeitable dividend equivalents, are considered participating securities. Calculations of EPS under the two-class method exclude from the numerator any dividends paid or owed on participating securities and any undistributed earnings considered to be attributable to participating securities. The related participating securities are similarly excluded from the denominator. However, these participating securities have been immaterial for all the years presented.

Anti-dilutive shares outstanding for the years ended December 31, 2022, 2021 and 2020 were immaterial.

22. Subsequent Events

There were no reportable events subsequent to December 31, 2022.

Item 9. Changes in and Disagreements with Accountants on Accounting and Financial Disclosure

There have been no changes to and no disagreements with our independent auditors regarding accounting or financial disclosure matters in our two most recent fiscal years.

Item 9A. Controls and Procedures

Evaluation of Disclosure Controls and Procedures

An evaluation has been carried out by the Company's management, under the supervision and with the participation of the Company's Chief Executive Officer and Chief Financial Officer, of the effectiveness of the design and operation of our disclosure controls and procedures (as such term is defined in Rules 13a-15(e) and 15d-15(e) under the Securities Exchange Act of 1934, as amended (the "Exchange Act")) as of the end of the period covered by this report. Based on such evaluation, the Company's Chief Executive Officer and Chief Financial Officer have concluded that, as of the end of such period, the Company's disclosure controls and procedures are effective.

Internal Control over Financial Reporting

(a) Management's Annual Report on Internal Control Over Financial Reporting

Management of the Company is responsible for establishing and maintaining adequate internal control over financial reporting.

Internal control over financial reporting is defined in Rules 13a-15(f) and 15d-15(f) under the Exchange Act as a process designed by, or under the supervision of, the Company's principal executive and principal financial officers and effected by the Company's board of directors, management and other personnel to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles and includes those policies and procedures that:

- pertain to the maintenance of records that in reasonable detail accurately and fairly reflect the transactions and dispositions of the assets of the Company;
- provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the Company are being made only in accordance with authorizations of management and directors of the Company; and
- provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use or disposition of the Company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Projections of any evaluation of effectiveness to future periods are subject to the risks that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

Management assessed the effectiveness of Autoliv's internal control over financial reporting as of December 31, 2022. In making this assessment, we used the criteria set forth by the Committee of Sponsoring Organizations of the Treadway Commission (COSO) in Internal Control – Integrated Framework (2013 framework).

Based on our assessment, we believe that, as of December 31, 2022, the Company's internal control over financial reporting is effective.

(b) Attestation Report of the Registered Public Accounting Firm

Ernst & Young AB has issued an attestation report on the Company's internal control over financial reporting, which is included herein as the Report of Independent Registered Public Accounting Firm under Item 8. Financial Statements and Supplementary Data for the year ended December 31, 2022.

(c) Changes in Internal Control over Financial Reporting

There have not been any changes in the Company's internal control over financial reporting (as such term is defined in Rules 13a-15(f) and 15d-15(f) under the Exchange Act) during the quarter ended December 31, 2022 that have materially affected, or are reasonably likely to materially affect, the Company's internal control over financial reporting.

Item 9B. Other Information

None.

PART III

Item 10. Directors, Executive Officers and Corporate Governance

The information required by Item 10. regarding executive officers, directors and nominees for election as directors of Autoliv, Autoliv's Audit Committee, Autoliv's code of ethics, and compliance with Section 16(A) of the Securities Exchange Act is incorporated herein by reference from the information under the captions "Executive Officers of the Company" and "Proposal 1: Election of Directors", "Committees of the Board" and "Audit and Risk Committee Report", "Corporate Governance Guidelines and Codes of Conduct", and "Delinquent Section 16(a) Reports", respectively, in the Company's 2023 Proxy Statement. Information on Board meeting attendance is provided under the caption "Board Meetings" in the 2023 Proxy Statement and incorporated herein by reference.

Item 11. Executive Compensation

The information required by Item 11. regarding executive compensation for the year ended December 31, 2022 is included under the caption "Compensation Discussion and Analysis" in the 2023 Proxy Statement and is incorporated herein by reference. The information required by the same item regarding Leadership Development and Compensation Committee is included in the sections "Leadership Development and Compensation Committee Interlocks and Insider Participation" and "Leadership Development and Compensation Committee Report" in the 2023 Proxy Statement and is incorporated herein by reference.

Item 12. Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters

The information required by Item 12. regarding beneficial ownership of Autoliv's common stock is included under the caption "Security Ownership of Certain Beneficial Owners and Management" in the 2023 Proxy Statement and is incorporated herein by reference.

Shares Previously Authorized for Issuance Under the 1997 Stock Incentive Plan

The following table provides information as of December 31, 2022, about the common stock that may be issued under the Autoliv, Inc. Stock Incentive Plan. The Company does not have any equity compensation plans that have not been approved by its stockholders.

Plan Category	(a) Number of Securities to be issued upon exercise of outstanding options, warrants and rights	(b) Weighted- average exercise price of outstanding options, warrants and rights(2)	(c) Number of securities remaining available for future issuance under equity compensation plans (excluding securities reflected in column (a))(3)
Equity compensation plans approved by security holders (1)	333,703	\$ 70.77	2,658,218
Equity compensation plans not approved by security holders	—	—	—
Total	333,703	\$ 70.77	2,658,218

(1) Autoliv, Inc. Stock Incentive Plan, as amended and restated on May 6, 2009, as amended by Amendment No. 1 dated December 17, 2010 and Amendment No. 2 dated May 8, 2012.

(2) Excludes restricted stock units and performance shares which convert to shares of common stock for no consideration.

(3) All such shares are available for issuance pursuant to grants of full-value stock awards.

Item 13. Certain Relationships and Related Transactions, and Director Independence

Information regarding the Company's policy and procedures concerning related party transactions is included under the caption "Related Person Transactions" in the 2023 Proxy Statement and is incorporated herein by reference. Information regarding director independence can be found under the caption "Board Independence" in the 2023 Proxy Statement and is incorporated herein by reference.

Item 14. Principal Accountant Fees and Services

The information required by Item 9(e) of Schedule 14A regarding principal accounting fees and the information required by Item 14 regarding the pre-approval process of accounting services provided to Autoliv is included under the caption "Proposal 3. Ratification of Appointment of Independent Registered Public Accounting Firm Appointment" in the 2023 Proxy Statement and is incorporated herein by reference.

PART IV

Item 15. Exhibit and Financial Statement Schedules

(a) Documents Filed as Part of this Report

(1) Financial Statements

- (i) Consolidated Statements of Income – Years ended December 31, 2022, 2021 and 2020;
- (ii) Consolidated Statements of Comprehensive Income – Years ended December 31, 2022, 2021 and 2020;
- (iii) Consolidated Balance Sheets – as of December 31, 2022 and 2021;
- (iv) Consolidated Statements of Cash Flows – Years ended December 31, 2022, 2021 and 2020;
- (v) Consolidated Statements of Total Equity – as of December 31, 2022, 2021 and 2020;
- (vi) Notes to Consolidated Financial Statements; and
- (vii) Reports of Independent Registered Public Accounting Firm (PCAOB Auditor ID No. 1433).

(2) Financial Statement Schedules

All of the schedules specified under Regulation S-X to be provided by Autoliv have been omitted either because they are not applicable, they are not required, or the information required is included in the financial statements or notes thereto.

(3) Exhibits

Exhibit No.	Description
2.1	<u>Distribution Agreement, dated June 28, 2018, between Veoneer, Inc. and Autoliv, Inc., incorporated herein by reference to Exhibit 2.1 to the Current Report on Form 8-K (File No. 001-12933, filing date July 2, 2018).</u>
3.1	<u>Autoliv's Restated Certificate of Incorporation, as amended, incorporated herein by reference to Exhibit 3.1 to the Quarterly Report on Form 10-Q (File No. 001-12933, filing date April 22, 2015).</u>
3.2	<u>Autoliv's Third Restated By-Laws, incorporated herein by reference to Exhibit 3.1 to the Current Report on Form 8-K (File No. 001-12933, filing date December 18, 2015).</u>
4.1	<u>Indenture, dated March 30, 2009, between Autoliv, Inc. and U.S. Bank National Association, as trustee, incorporated herein by reference to Exhibit 4.1 to Autoliv's Registration Statement on Form 8-A (File No. 001-12933, filing date March 30, 2009).</u>
4.2	<u>Second Supplemental Indenture (including Form of Global Note), dated March 15, 2012, between Autoliv, Inc. and U.S. Bank National Association, as trustee, incorporated herein by reference to Exhibit 4.1 to the Current Report on Form 8-K (File No. 001-12933, filing date March 15, 2012).</u>
4.3	<u>Form of Note Purchase and Guaranty Agreement dated April 23, 2014, among Autoliv ASP, Inc., Autoliv, Inc. and the purchasers named therein, incorporated herein by reference to Exhibit 4.6 to the Quarterly Report on Form 10-Q (File No. 001-12933, filing date April 25, 2014).</u>
4.4	<u>Amendment and Waiver 2014 Note Purchase and Guaranty Agreement, dated May 24, 2018 among Autoliv, Inc., Autoliv ASP, Inc. and the noteholders named therein, incorporated herein by reference to Exhibit 4.4 to the Quarterly Report on Form 10-Q (File No. 001-12933, filing date July 27, 2018).</u>
4.5	<u>General Terms and Conditions for Swedish Depository Receipts in Autoliv, Inc., representing common shares in Autoliv, Inc., effective as of May 30, 2018 with Skandinaviska Enskilda Banken AB (publ) serving as a custodian, incorporated herein by reference to Exhibit 4.5 to the Quarterly Report on Form 10-Q (File No. 001-12933, filing date July 27, 2018).</u>
4.6	<u>Agency Agreement dated June 26, 2018 among Autoliv, Inc., Autoliv ASP Inc. and HSBC Bank PLC, incorporated herein by reference to Exhibit 4.6 to the Quarterly Report on Form 10-Q (File No. 001-12933, filing date July 27, 2018).</u>
4.7	<u>Description of Registrant's Securities, incorporated by reference to Exhibit 4.13 to the Annual Report on Form 10-K (File No. 001-12933, filing date February 19, 2021).</u>
4.8	<u>Base Listing Particulars Agreement, dated February 22, 2022, among Autoliv, Inc., Autoliv ASP, Inc. and the dealers named therein, incorporated herein by reference to Exhibit 4.12 to the Quarterly Report on Form 10-Q (File No. 001-12933, filing date April 22, 2022).</u>
4.9	<u>Amended and Restated Programme Agreement, dated February 22, 2022, among Autoliv, Inc., Autoliv ASP, Inc. and the dealers named therein, incorporated herein by reference to Exhibit 4.13 to the Quarterly Report on Form 10-Q (File No. 001-12933, filing date April 22, 2022).</u>

- 4.10 [Amended and Restated Agency Agreement, dated February 22, 2022, among Autoliv, Inc., Autoliv ASP, Inc. and the dealers named therein, incorporated herein by reference to Exhibit 4.14 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 22, 2022\).](#)
- 4.11 [Description of Registrant's Securities, incorporated by reference to Exhibit 4.13 to the Annual Report on Form 10-K \(File No. 001-12933, filing date February 19, 2021\)](#)
- 10.1+ [Autoliv, Inc. 1997 Stock Incentive Plan, as amended and restated on May 6, 2009, incorporated herein by reference to Appendix A of the Definitive Proxy Statement of Autoliv, Inc. on Schedule 14A \(filing date March 23, 2009\).](#)
- 10.2+ [Amendment No. 1 to the Autoliv, Inc. 1997 Stock Incentive Plan as amended and restated on May 6, 2009, dated December 17, 2010, incorporated herein by reference to Exhibit 10.24 to the Annual Report on Form 10-K \(File No. 001-12933, filing date February 23, 2011\).](#)
- 10.3+ [Amendment No. 2 to the Autoliv, Inc. 1997 Stock Incentive Plan, as amended and restated on May 6, 2009, dated May 8, 2012, incorporated herein by reference to Exhibit 10.29 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 20, 2012\).](#)
- 10.4 [Form of Note Purchase and Guaranty Agreement, dated April 23, 2014, among Autoliv ASP, Inc., Autoliv, Inc. and the purchasers named therein, incorporated herein by reference to Exhibit 4.6 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 25, 2014\).](#)
- 10.5 [General Terms and Conditions for Swedish Depository Receipts in Autoliv, Inc. representing common shares in Autoliv, Inc., effective as of May 30, 2018, with Skandinaviska Enskilda Banken AB \(publ\) serving as custodian, incorporated herein by reference to Exhibit 4.5 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 27, 2018\).](#)
- 10.6+ [Amendment No. 3 to the Autoliv, Inc. 1997 Stock Incentive Plan, as amended and restated, dated April 24, 2017, incorporated herein by reference to Exhibit 10.2 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 28, 2017\).](#)
- 10.7 [Tax Matters Agreement, dated June 28, 2018, between Veoneer, Inc. and Autoliv, Inc., incorporated herein by reference to Exhibit 10.2 to the Current Report on Form 8-K \(File No. 001-12933, filing date July 2, 2018\).](#)
- 10.8+ [Employment Agreement, effective as of June 29, 2018, by and between Autoliv, Inc. and Mikael Bratt, incorporated herein by reference to Exhibit 10.8 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 27, 2018\).](#)
- 10.9+ [Employment Agreement, dated March 21, 2018 and effective as of June 29, 2018, by and between Autoliv, Inc. and Jordi Lombarte incorporated herein by reference to Exhibit 10.12 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 27, 2018\).](#)
- 10.10+ [Employment Agreement, effective as of June 29, 2018, by and between Autoliv, Inc. and Anthony J. Nellis, incorporated herein by reference to Exhibit 10.14 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 27, 2018\).](#)
- 10.11 [Cooperation Agreement, dated March 1, 2019, between Autoliv, Inc. and Cevian Capital II GP Limited, incorporated herein by reference to Exhibit 10.1 to the Current Report on Form 8-K \(File No. 001-12933, filing date March 1, 2019\).](#)
- 10.12+ [Employment Agreement, dated April 23, 2019, between Autoliv, Inc. and Frithjof Oldorff, incorporated herein by reference to Exhibit 10.3 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date October 25, 2019\).](#)
- 10.13+ [Employment Agreement, dated March 18, 2019, between Autoliv, Inc. and Christian Swahn, incorporated herein by reference to Exhibit 10.4 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date October 25, 2019\).](#)
- 10.14+ [Employment Agreement, dated February 15, 2019, between Autoliv, Inc. and Magnus Jarlegren, incorporated herein by reference to Exhibit 10.5 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date October 25, 2019\).](#)
- 10.15 [Form of Indemnification Agreement between Autoliv, Inc. and its directors and certain of its executive officers, incorporated herein by reference to Exhibit 10.6 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date October 25, 2019\).](#)
- 10.16+ [Employment Agreement, dated November 26, 2019 and effective as of March 1, 2020, between Autoliv, Inc. and Fredrik Westin, incorporated herein by reference to Exhibit 10.56 to the Annual Report on Form 10-K \(File No. 001-12933, filing date February 21, 2020\).](#)
- 10.17+ [Employment Agreement, dated January 23, 2020, between Autoliv, Inc. and Svante Mogefors, incorporated herein by reference to Exhibit 10.58 to the Annual Report on Form 10-K \(File No. 001-12933, filing date February 21, 2020\).](#)
- 10.18+ [Form of Employee restricted stock units grant agreement \(2020\) to be used the Autoliv, Inc 1997 Stock Incentive Plan, as amended and restated, incorporated herein by reference to Exhibit 10.4 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 24, 2020\).](#)
- 10.19+ [Form of Employee performance share units grant agreement \(2020\) to be used under the Autoliv, Inc 1997 Stock Incentive Plan, as amended and restated, incorporated herein by reference to Exhibit 10.5 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 24, 2020\).](#)

- 10.20 [Facility Agreement, dated May 28, 2020, by and among Autoliv AB, as borrower, Autoliv, Inc. and Autoliv ASP, as guarantors, and AB Svensk Exportkredit, as lender, incorporated herein by reference to Exhibit 10.1 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 17, 2020\).](#)
- 10.21+ [Form of Non-Employee Directors 2020 restricted stock units grant agreement under the Autoliv, Inc 1997 Stock Incentive Plan, as amended and restated, incorporated herein by reference to Exhibit 10.2 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 17, 2020\).](#)
- 10.22+ [Employment Agreement, dated May 20, 2020 and effective as of July 1, 2020, between Autoliv, Inc. and Per Ericson, incorporated herein by reference to Exhibit 10.3 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 17, 2020\).](#)
- 10.23+ [Employment Agreement, dated June 8, 2020 and effective as of June 15, 2020, by between Autoliv, Inc. and Kevin Fox, incorporated herein by reference to Exhibit 10.4 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 17, 2020\).](#)
- 10.24+ [Employment Agreement, effective as of August 17, 2020, by and between Autoliv AB and Mikael Hagström incorporated herein by reference to Exhibit 10.2 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date October 23, 2020\).](#)
- 10.25+* [Amendment No. 1, effective as of July 1, 2020, to Employment Agreement, effective March 21, 2018, by and between Autoliv Inc. and Jordi Lombarte.](#)
- 10.26+ [Amendment No. 2, effective as of March 9, 2021, to Employment Agreement, effective March 21, 2018, by and between Autoliv Inc. and Jordi Lombarte incorporated herein by reference to Exhibit 10.1 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 23, 2021\).](#)
- 10.27+ [Employment Agreement, dated October 1, 2020 and effective as of November 1, 2020, by and between Autoliv Inc. and Colin Naughton incorporated herein by reference to Exhibit 10.2 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 23, 2021\).](#)
- 10.28+ [Form of Employee restricted stock units grant agreement \(2021\) to be used under the Autoliv, Inc 1997 Stock Incentive Plan, as amended and restated, incorporated herein by reference to Exhibit 10.3 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 23, 2021\).](#)
- 10.29+ [Form of Employee performance share units grant agreement \(2021\) to be used the Autoliv, Inc 1997 Stock Incentive Plan, as amended and restated, incorporated herein by reference to Exhibit 10.4 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 23, 2021\).](#)
- 10.30+ [Amendment No. 1, effective as of April 1, 2021, to Employment Agreement, effective March 18, 2019, by and between Autoliv Inc. and Christian Swahn incorporated herein by reference to Exhibit 10.5 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 23, 2021\).](#)
- 10.31+ [Employment Agreement, dated December 14, 2021 and effective as of January 19, 2021, by and between Autoliv Inc. and Sng Yih incorporated herein by reference to Exhibit 10.46 to the Annual Report on Form 10-K \(File No. 001-12933, filing date February 22, 2022\).](#)
- 10.32+ [Form of Employee restricted stock units grant agreement \(2022\) to be used under the Autoliv, Inc 1997 Stock Incentive Plan, as amended and restated, incorporated herein by reference to Exhibit 10.1 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 22, 2022\).](#)
- 10.33+ [Form of Employee performance share units grant agreement \(2022\) to be used promised under the Autoliv, Inc 1997 Stock Incentive Plan, as amended and restated, incorporated herein by reference to Exhibit 10.2 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date April 22, 2022\).](#)
- 10.34 [Facilities Agreement, dated May 23, 2022, among Autoliv, Inc., Autoliv ASP, Inc., Citibank, N.A., London Branch, Mizuho Bank, Ltd., Skandinaviska Enskilda Banken AB \(publ\), and the other parties and lenders named therein, incorporated herein by reference to Exhibit 10.1 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 22, 2022\).](#)
- 10.35+ [Form of Non-Employee Directors restricted stock units grant agreement \(2022\) to be used under the Autoliv, Inc. 1997 Stock Incentive Plan, as amended and restated incorporated herein by reference to Exhibit 10.2 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date July 22, 2022\).](#)
- 10.36+ [Autoliv, Inc. Non-employee Director Compensation Policy, effective November 1, 2022 incorporated herein by reference to Exhibit 10.1 to the Quarterly Report on Form 10-Q \(File No. 001-12933, filing date October 21, 2022\).](#)
- 10.37+* [Employment Agreement, dated December 1, 2022 and effective as of January 15, 2023, by and between Autoliv, Inc. and Jonas Jademyr.](#)
- 10.38+* [Amendment, dated and effective December 5, 2022, to Employment Agreement, effective as of January 23, 2020, by and between Autoliv, Inc. and Svante Mogefors.](#)
- 21* [Autoliv's List of Subsidiaries.](#)

- 23* [Consent of Independent Registered Public Accounting Firm.](#)
- 31.1* [Certification of Chief Executive Officer, pursuant to Rule 13a-14\(a\) promulgated under the Securities Exchange Act of 1934, as amended.](#)
- 31.2* [Certification of Chief Financial Officer, pursuant to Rule 13a-14\(a\) promulgated under the Securities Exchange Act of 1934, as amended.](#)
- 32.1* [Certification of Chief Executive Officer, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to section 906 of the Sarbanes-Oxley Act of 2002.](#)
- 32.2* [Certification of Chief Financial Officer, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to section 906 of the Sarbanes-Oxley Act of 2002.](#)
- 101.INS* Inline XBRL Instance Document – The instance document does not appear in the Interactive Data File because its XBRL tags are embedded within the inline XBRL document.
- 101.SCH* Inline XBRL Taxonomy Extension Schema Document.
- 101.CAL* Inline XBRL Taxonomy Extension Calculation Linkbase Document.
- 101.DEF* Inline XBRL Taxonomy Extension Definition Linkbase Document.
- 101.LAB* Inline XBRL Taxonomy Extension Label Linkbase Document.
- 101.PRE* Inline XBRL Taxonomy Extension Presentation Linkbase Document.
- 104* Cover Page Interactive Data File (embedded within the inline XBRL document).

* Filed herewith.

+ Management contract or compensatory plan.

† Confidential treatment requested as to portions of the exhibit. Confidential materials omitted and filed separately with the Securities and Exchange Commission.

SIGNATURES

Pursuant to the requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized, as of February 16, 2023.

AUTOLIV, INC.
(Registrant)

By /s/ Fredrik Westin
Fredrik Westin
Chief Financial Officer

Pursuant to the requirements of the Securities Exchange Act of 1934, this report has been signed below by the following persons on behalf of the registrant and in the capacities indicated, as of February 16, 2023.

Title	Name
Chairman of the Board of Directors	<u>/s/ Jan Carlson</u> Jan Carlson
Chief Executive Officer and President (Principal Executive Officer) and Director	<u>/s/ Mikael Bratt</u> Mikael Bratt
Chief Financial Officer (Principal Financial and Principal Accounting Officer)	<u>/s/ Fredrik Westin</u> Fredrik Westin
Director	<u>/s/ Laurie Brlas</u> Laurie Brlas
Director	<u>/s/ Hasse Johansson</u> Hasse Johansson
Director	<u>/s/ Leif Johansson</u> Leif Johansson
Director	<u>/s/ Franz-Josef Kortüm</u> Franz-Josef Kortüm
Director	<u>/s/ Frédéric Lissalde</u> Frédéric Lissalde
Director	<u>/s/ Xiaozhi Liu</u> Xiaozhi Liu
Director	<u>/s/ Gustav Lundgren</u> Gustav Lundgren
Director	<u>/s/ Martin Lundstedt</u> Martin Lundstedt
Director	<u>/s/ Thaddeus Senko</u> Thaddeus Senko

Glossary and Definitions

In this report, the following company or industry specific terms and abbreviations are used:

BCC

Best Cost Country.

CASH CONVERSION

Free cash flow in relation to net income.

CAPITAL EMPLOYED

Total equity and net debt (net cash).

CAPITAL EXPENDITURES

Investments in property, plant and equipment.

CAPITAL TURN-OVER RATE

Annual sales in relation to average capital employed.

CPV

Content Per Vehicle, i.e. value of the safety products in a vehicle.

DEVELOPED MARKETS

Includes North America, Western Europe, Japan and South Korea

EARNINGS PER SHARE

Net income attributable to controlling interest relative to weighted average number of shares (net of treasury shares) assuming dilution and basic, respectively.

EBIT

Earnings before interest and taxes.

EBITDA

Earnings before interest, taxes, depreciation, and amortization

FREE CASH FLOW

Cash flows from operating activities less capital expenditures, net.

GROSS MARGIN

Gross profit relative to sales.

GROWTH MARKETS

Includes all markets except North America, Western Europe, Japan and South Korea.

HEADCOUNT

Employees plus temporary personnel.

INVENTORY OUTSTANDING IN RELATION TO SALES

Outstanding inventory relative to annualized fourth quarter sales.

LEVERAGE RATIO

Debt per the Policy (Net debt adjusted for pension liabilities) in relation to EBITDA per the Policy (Adjusted EBITDA) (Earnings Before Interest, Taxes, Depreciation and Amortization, other non-operating items, net, income from equity method investments and capacity alignments), see Item 7 for a calculation of this non-U.S. GAAP measure.

LMPU

Labor minutes per produced unit.

LVP

Light vehicle production of light motor vehicles with a gross weight of up to 3.5 metric tons.

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NET DEBT

Short and long-term debt including debt-related derivatives less cash and cash equivalents, see Non-U.S. GAAP Performance Measures in Item 7 for a reconciliation of this non-U.S. GAAP measure.

NET DEBT TO CAPITALIZATION

Net debt in relation to total equity (including non-controlling interest) and net debt.

NUMBER OF EMPLOYEES

Employees with a continuous employment agreement, recalculated to full time equivalent heads.

OEM

Original Equipment Manufacturer referring to customers assembling new vehicles.

OPERATING MARGIN

Operating income relative to sales.

OPERATING WORKING CAPITAL

Current assets excluding cash and cash equivalents less current liabilities excluding short-term debt. Any current derivatives reported in current assets and current liabilities related to net debt are excluded from operating working capital. See Non-U.S. GAAP Performance Measures in Item 7 for reconciliation of this non-U.S. GAAP measure.

OUR MARKET

Our products include seatbelts, airbags and steering wheels.

PAYABLES OUTSTANDING IN RELATION TO SALES

Outstanding payables relative to annualized fourth quarter sales.

PRETAX MARGIN

Income before taxes relative to sales.

RECEIVABLES OUTSTANDING IN RELATION TO SALES

Outstanding receivables relative to annualized fourth quarter sales.

RETURN ON CAPITAL EMPLOYED

Operating income and equity in earnings of affiliates, relative to average capital employed.

RETURN ON TOTAL EQUITY

Net income relative to average total equity.

ROA

Rest of Asia includes all Asian countries except China and Japan.

TOTAL EQUITY RATIO

Total equity relative to total assets.

TRADE WORKING CAPITAL

Outstanding receivables and outstanding inventory less outstanding payables.

Multi-Year Financial Summary

Continuing Operations unless noted.

(Dollars in millions, unaudited)	2022	2021	2020	2019	2018
Sales and Income					
Net sales	\$8,842	\$8,230	\$7,447	\$8,548	\$8,678
Airbag sales ¹⁾	5,807	5,380	4,824	5,676	5,699
Seatbelt sales	3,035	2,850	2,623	2,871	2,980
Operating income	659	675	382	726	686
Net income attributable to controlling interest	423	435	187	462	376
Earnings per share (US\$) – basic ²⁾	4.86	4.97	2.14	5.29	4.32
Earnings per share (US\$) – assuming dilution ^{2, 3)}	4.85	4.96	2.14	5.29	4.31
Gross margin ⁴⁾	15.8%	18.4%	16.7%	18.5%	19.7%
R,D&E net in relation to sales	(4.4)%	(4.7)%	(5.0)%	(4.7)%	(4.8)%
S,G&A in relation to sales	(4.9)%	(5.3)%	(5.2)%	(4.7)%	(4.5)%
Operating margin ⁵⁾	7.5%	8.2%	5.1%	8.5%	7.9%
Adjusted operating margin ^{6, 7)}	6.8%	8.3%	6.5%	9.1%	10.5%
Balance Sheet					
Trade working capital ⁸⁾	1,183	1,332	1,366	1,417	1,396
Trade working capital in relation to sales ⁹⁾	12.7%	15.7%	13.6%	16.2%	15.9%
Receivables outstanding in relation to sales ¹⁰⁾	20.4%	20.0%	18.1%	18.6%	19.0%
Inventory outstanding in relation to sales ¹¹⁾	10.4%	9.2%	7.9%	8.5%	8.6%
Payables outstanding in relation to sales ¹²⁾	18.1%	13.5%	12.5%	10.8%	11.7%
Total equity	2,626	2,648	2,423	2,122	1,897
Total parent shareholders' equity per share (US\$)	30.30	30.10	27.56	24.19	21.63
Current assets excluding cash	3,119	2,705	3,091	2,557	2,670
Property, plant and equipment, net	1,960	1,855	1,869	1,816	1,690
Intangible assets (primarily goodwill)	1,382	1,395	1,412	1,410	1,423
Capital employed	3,810	3,700	3,637	3,772	3,516
Net debt ⁷⁾	1,184	1,052	1,214	1,650	1,619
Total assets	7,717	7,537	8,157	6,771	6,722
Long-term debt	1,054	1,662	2,110	1,726	1,609
Return on capital employed ^{13, 14)}	17.5%	18.3%	10.0%	20.0%	17.0%
Return on total equity ^{14, 15)}	16.3%	17.1%	9.0%	23.0%	13.0%
Total equity ratio	34%	35%	30%	31%	28%
Cash flow and other data					
Operating Cash flow ¹⁶⁾	713	754	849	641	591
Depreciation and amortization ¹⁶⁾	363	394	371	351	397
Capital expenditures, net ¹⁶⁾	485	454	340	476	555
Capital expenditures, net in relation to sales ¹⁶⁾	5.5%	5.5%	4.6%	5.6%	5.7%
Free Cash flow ^{7, 16, 17)}	228	300	509	165	36
Cash conversion ^{7, 16, 18)}	54%	69%	270%	36%	20%
Direct shareholder return ^{16, 19)}	339	165	54	217	214
Cash dividends paid per share (US\$)	2.58	1.88	0.62	2.48	2.46
Number of shares outstanding (millions) ²⁰⁾	86.2	87.5	87.4	87.2	87.1
Number of employees, December 31	61,700	55,900	61,000	58,900	57,700

1) Including steering wheels, inflators and initiators. 2) Participating share awards with right to receive dividend equivalents are (under the two-class method) excluded from the EPS calculation. 3) Assuming dilution and net of treasury shares. 4) Gross profit relative to sales. 5) Operating income relative to sales. 6) Excluding costs for capacity alignment, antitrust related matters and separation of our business segments. 7) Non-US GAAP measure, for reconciliation see tables above. 8) Outstanding receivables and outstanding inventory less outstanding payables. 9) Outstanding receivables and outstanding inventory less outstanding payables relative to annualized fourth quarter sales. 10) Outstanding receivables relative to annualized fourth quarter sales. 11) Outstanding inventory relative to annualized fourth quarter sales. 12) Outstanding payables relative to annualized fourth quarter sales. 13) Operating income and income from equity method investments, relative to average capital employed. 14) The Company has decided not to recalculate prior periods since the distribution of Veoneer had a significant impact on total equity and capital employed making the comparison less meaningful. 15) Income relative to average total equity. 16) Including Discontinued Operations in 2018. 17) Operating cash flow less Capital expenditures, net. 18) Free cash flow relative to Net income. 19) Dividends paid and Shares repurchased. 20) At year end, excluding dilution and net of treasury shares.



Autoliv is the world's largest automotive safety supplier, with operations in 27 countries and 14 Tech Centers worldwide. We design, develop and manufacture world-leading passive safety systems for the automotive industry, as well as mobility safety solutions. Inspired from the beginning by our vision of Saving More Lives, our 69,100 people are passionate about creating innovations and collaborations which best meet safety needs in both the current and new mobility horizons.



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