



BUILD ELECTRONICS BETTER

The Current Sentiment of the Global Electronics Manufacturing Supply Chain

Monitoring the Pulse of the Global Electronics Industry

September 2021

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- > The electronics supply chain continues to perform well despite challenging circumstances.
 - Manufacturers are reporting rising orders and improving capacity utilization.
- > Dislocations throughout the supply chain continue to hamper the current environment.
 - Backlogs are rising. And firms expect backlogs to continue to rise in the months ahead.
 - Inventories are extremely tight. Only 10% of firms report inventories from suppliers are rising and firms expect these inventories to remain constrained in the coming months.
 - Manufacturers report supply chain shortages are likely to remain acute.
 - > Fewer than one-tenth anticipate resolution by the end of 2021, with three-fifths who believe it won't be resolved until the second half of 2022 or beyond, with no differences by region or industry segment.

Executive Summary



- > The labor market remains tight.
 - Four-fifths of manufacturers indicate it is difficult to find qualified workers, with approximately half of those experiencing extreme difficulty.
 - 68% of firms report labor costs are rising and only 19 percent say the ease of recruiting and finding skilled talent is improving.
 - The outlook over the next 6 months is expected to see little change. Some 65% of firms expect labor costs to rise and only 23 percent expect the ease of recruiting and finding skilled talent to improve.
- > Supply Shortages are extending lead-times and raising prices.
 - Nine in ten manufacturers say lead times are currently up, with one-third reporting they are up 8+ weeks.
 - 90% of the electronics supply chain report the semiconductor shortage together with other supply issues have resulted in increased price paid to suppliers.
- > Rising costs are hurting profitability.
 - 90% of firms report rising material costs and the outlook for material costs is little improved.
 - Labor costs are rising for 68 percent of firms and 65 percent of firms expect labor costs to continue to rise in the coming months.
 - As a result of higher costs and disrupted production, profit margins are shrinking.

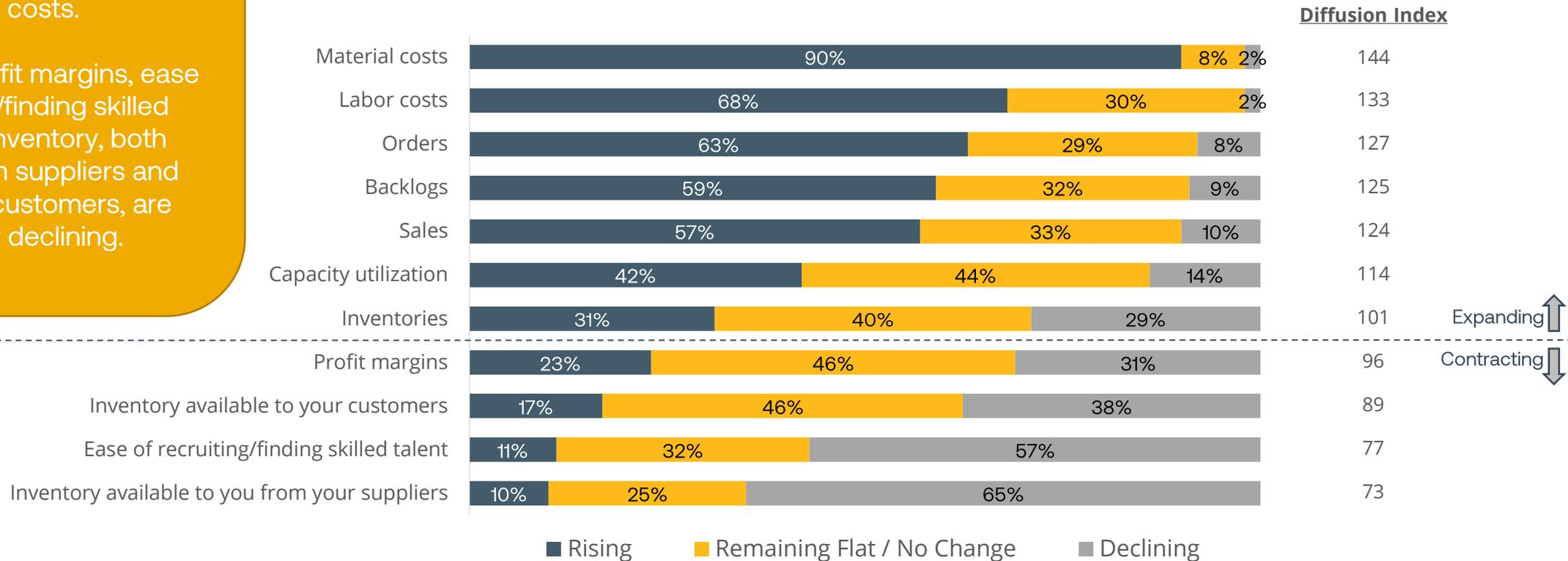
The Current Conditions for the Electronics Supply Chain is Challenging



Nine in ten manufacturers are currently experiencing increased materials costs, with seven in ten reporting increased labor costs.

As a result, profit margins, ease of recruiting/finding skilled talent, and inventory, both available from suppliers and available to customers, are currently declining.

Current Direction of Key Business Indicators



Regional Differences

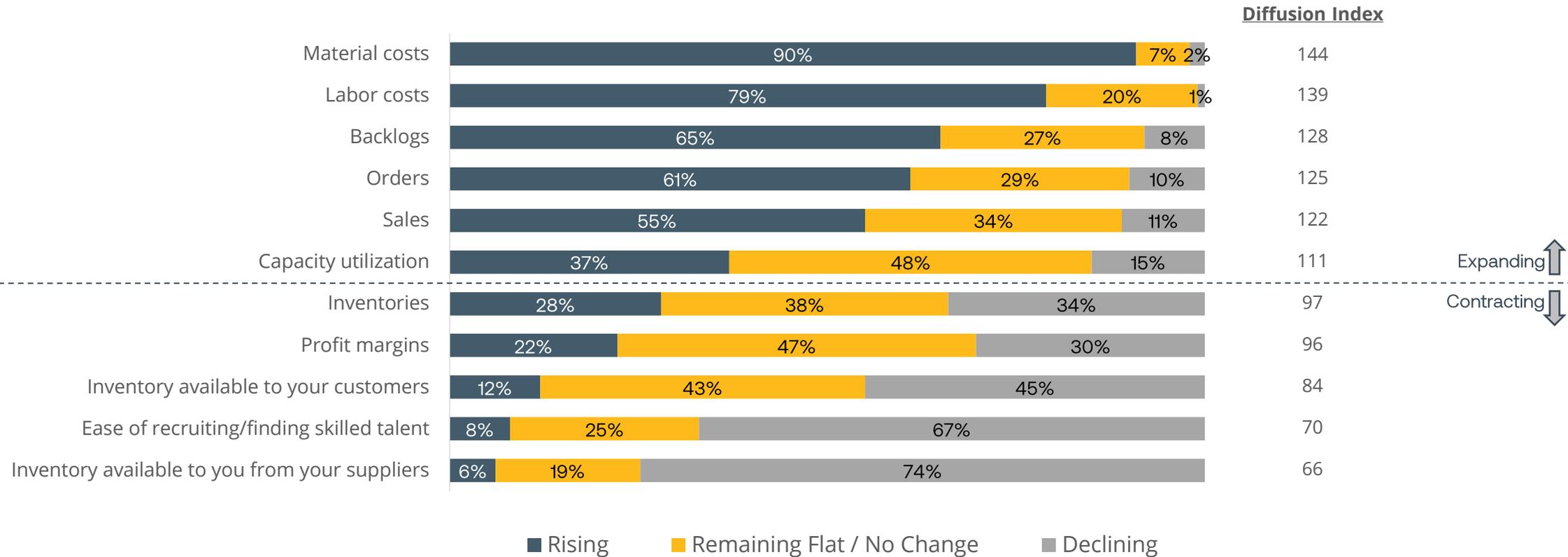


- Fewer firms in Europe appear to be facing rising labor costs.
 - 79% of North American firms and 63% of APAC firms report rising labor costs compared to just 45% in Europe.
- Order Backlogs are rising in North America and Europe but not in APAC.
 - 65% of North American firms and 60% of European firms report rising backlogs but just 42% of APAC firms report the same.
- The ease of recruiting workers declining in North America and Europe while rising in APAC.
 - 67% of North American firms and 63% of European firms report ease of recruiting workers is declining while 33% of APAC firms report the same.

The View From North America



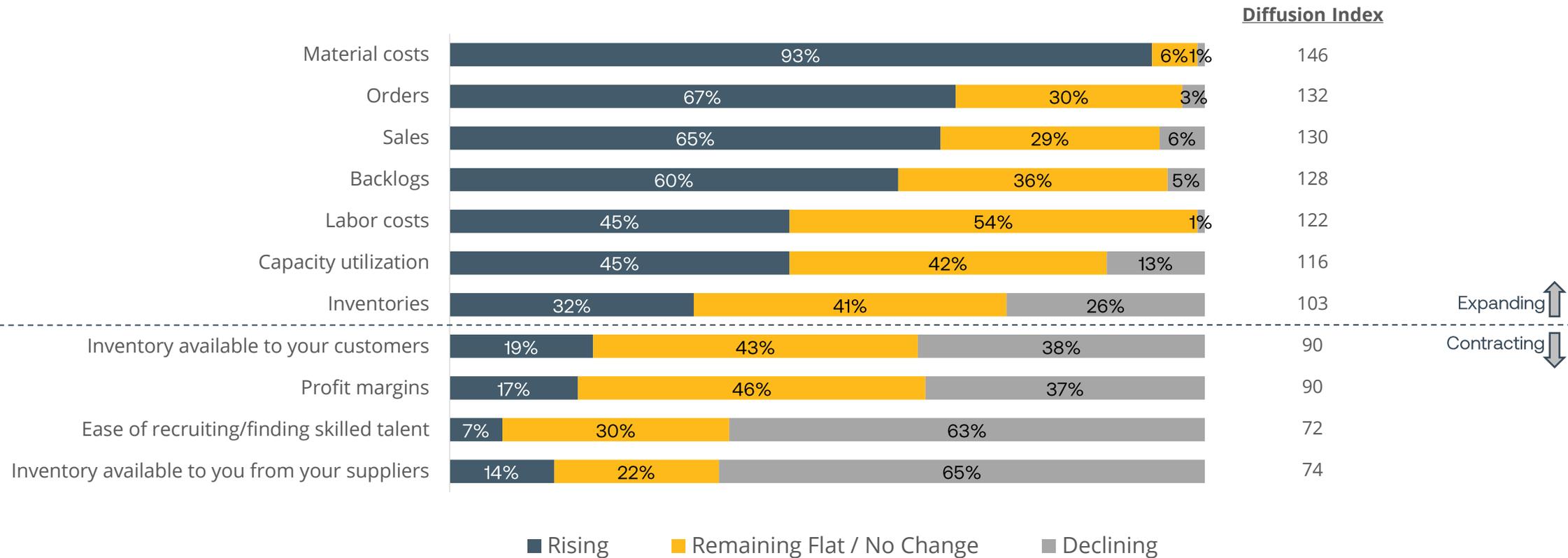
North America: Current Direction of Key Business Indicators



The View From Europe



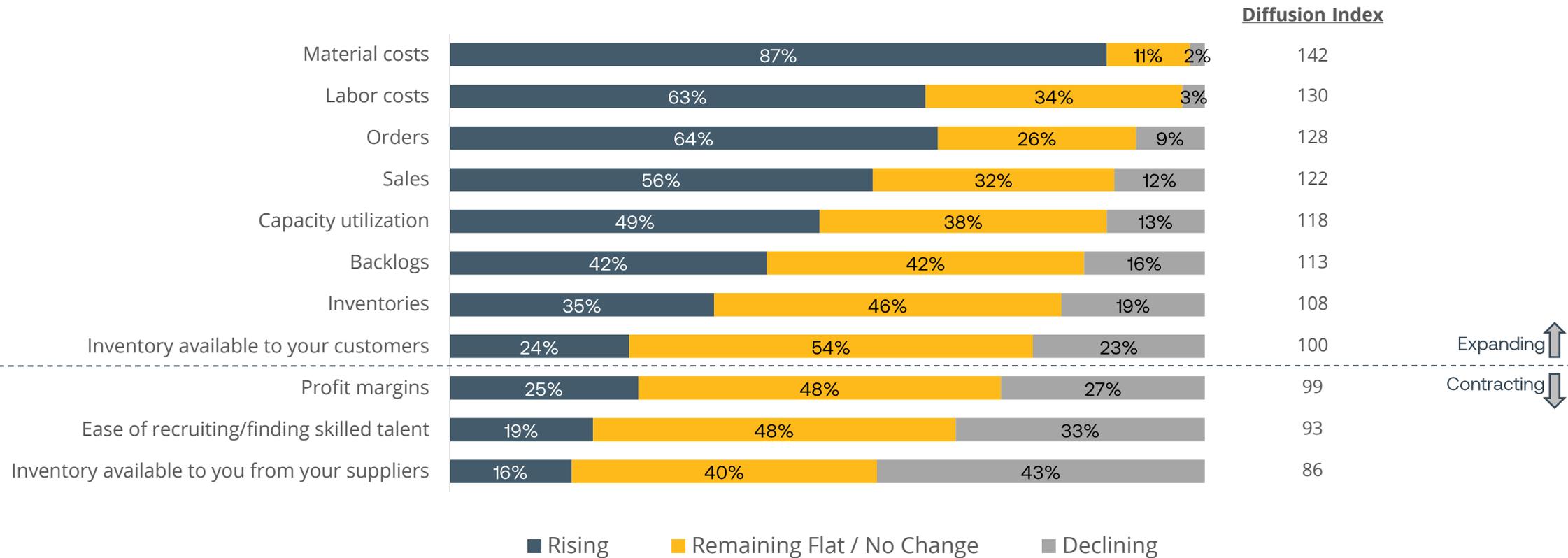
Europe: Current Direction of Key Business Indicators



The View From APAC



APAC: Current Direction of Key Business Indicators



The Outlook for the next 6 months is Little Changed

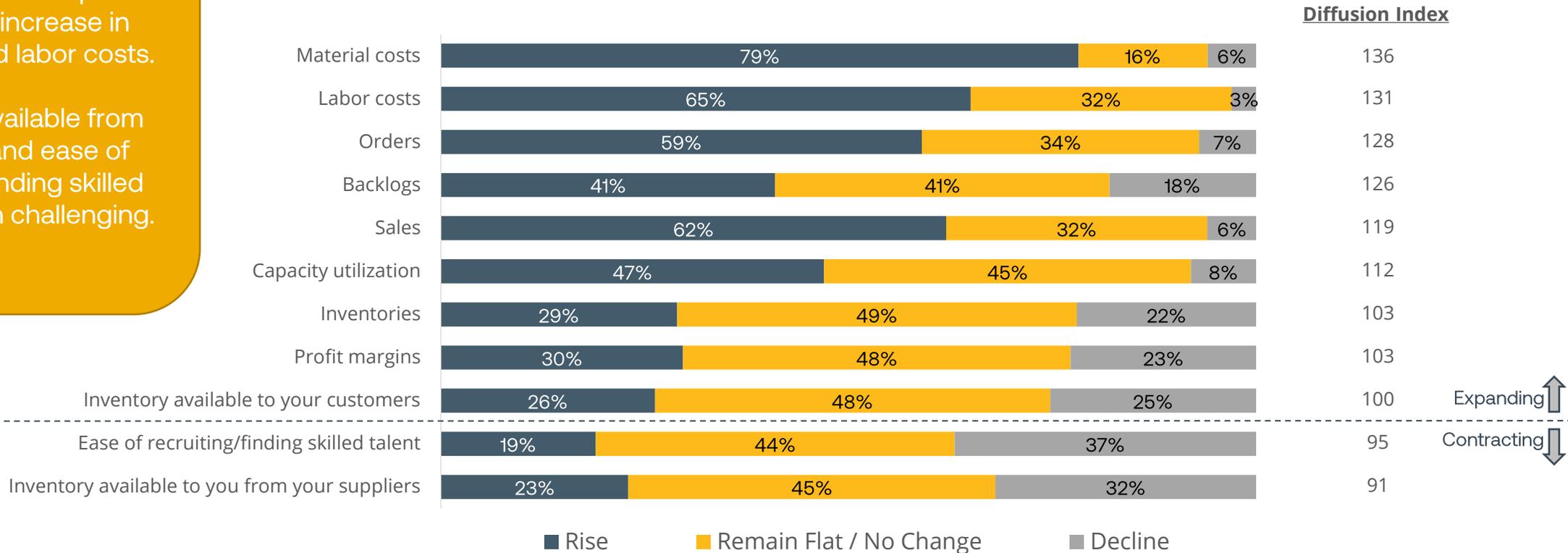


Manufacturers expect continued increase in materials and labor costs.

Inventory available from suppliers and ease of recruiting/finding skilled talent remain challenging.

Anticipated Direction of Key Business Indicators

-- Next Six Months --



Regional Differences in the Outlook

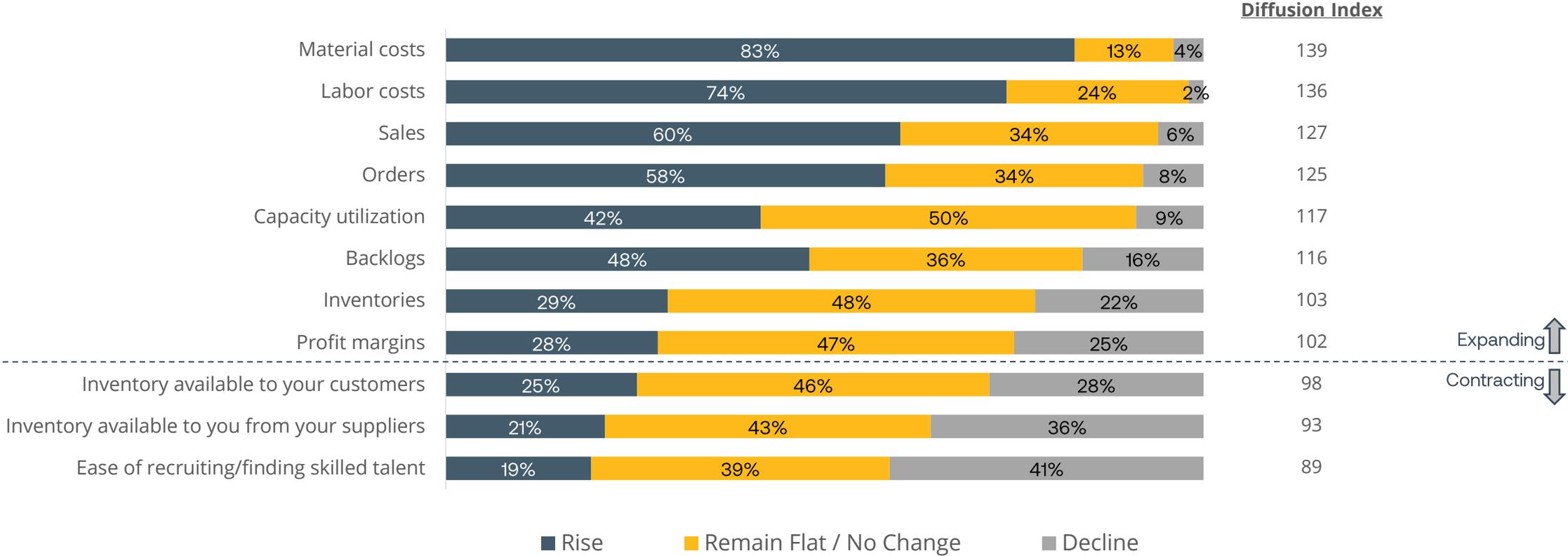


- Expectations for rising order backlogs is more pronounced in North America than in Europe and APAC.
- Manufacturers in North America and Europe are anticipating ease of recruiting to further deteriorate compared to APAC.
- A higher share of firms in North America and Europe expect material costs to rise in the coming months compared with APAC.
- A larger number of North American firms expect labor costs to rise compared with Europe and APAC.

The View From North America



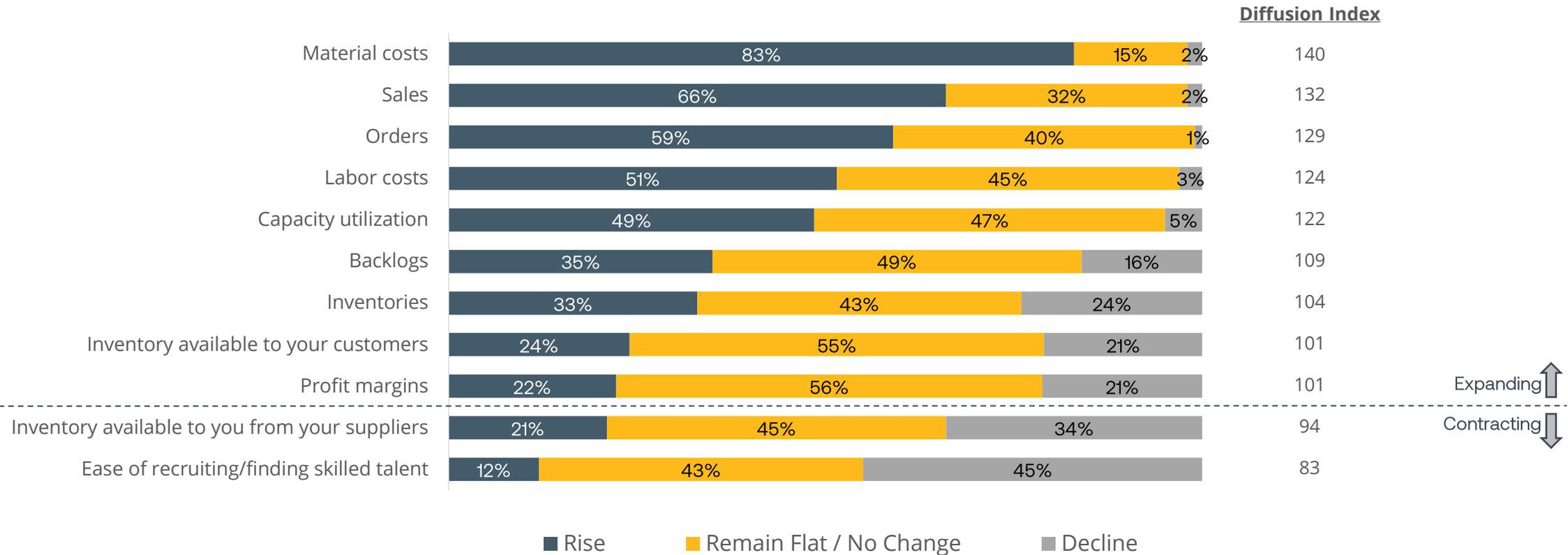
North America: Anticipated Direction of Key Business Indicators -- Next Six Months --



The View From Europe



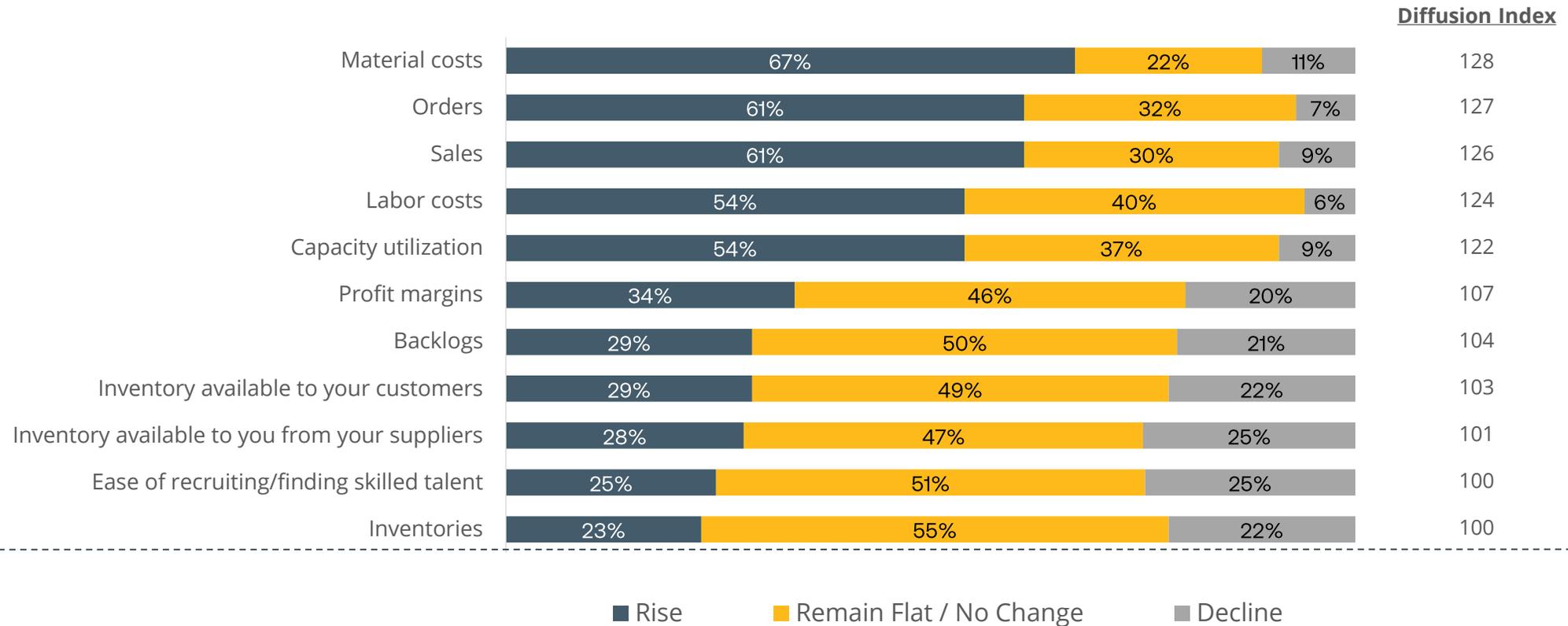
Europe: Anticipated Direction of Key Business Indicators -- Next Six Months --



The View From APAC



APAC: Anticipated Direction of Key Business Indicators -- Next Six Months --

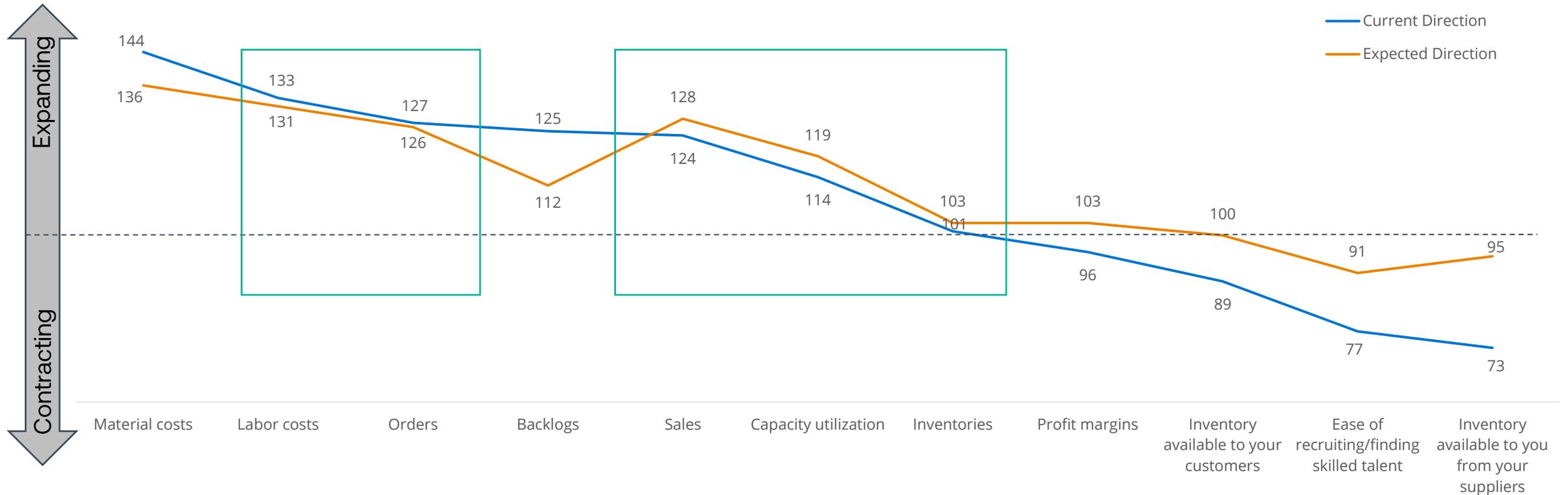


Globally, labor costs, orders, sales, capacity utilization, and inventories expected to remain relatively unchanged



All other key business indicators expected to see some level of improvement in the next six months

Direction of Key Business Indicators – Diffusion Index[^] -- Current vs. 6mo Anticipated --

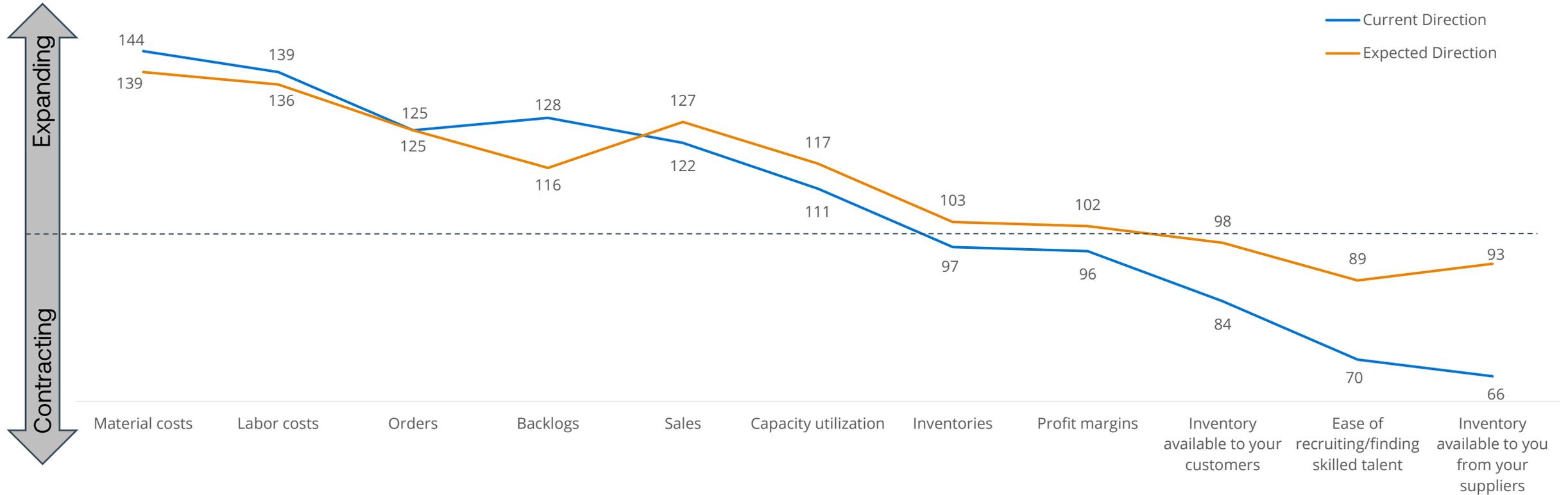


[^]A diffusion index is a statistical measure used to detect economic turning points.

The View from North America



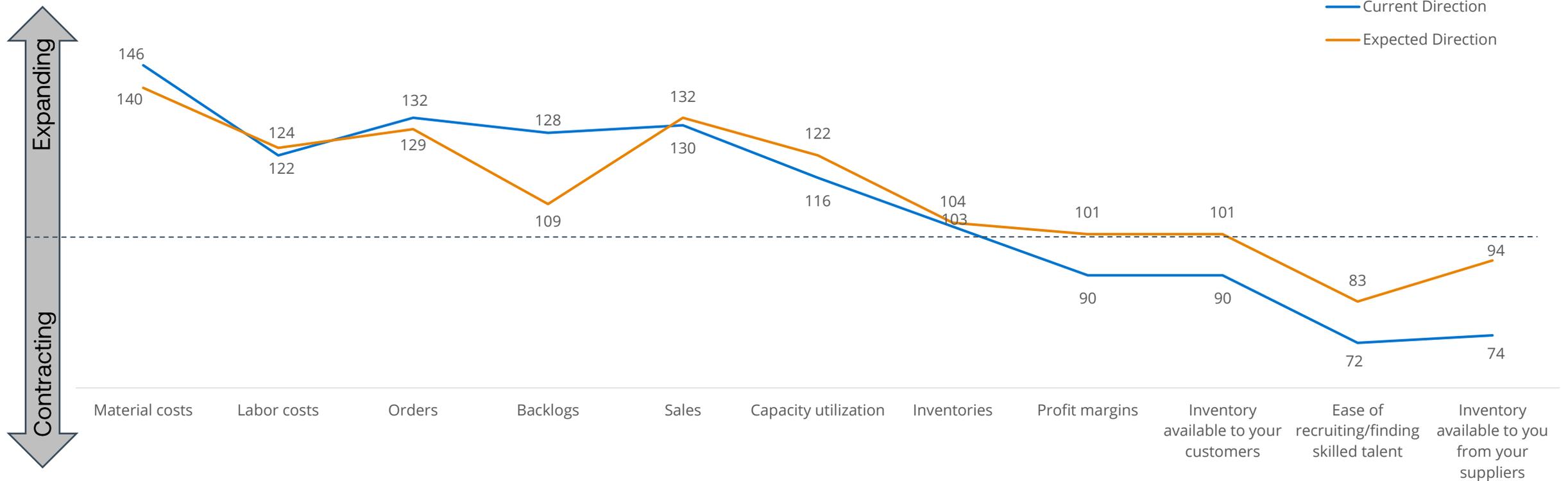
North America: Direction of Key Business Indicators – Diffusion Index[^]
 -- Current vs. 6mo Anticipated --



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The View from Europe

Europe: Direction of Key Business Indicators – Diffusion Index[^]
-- Current vs. 6mo Anticipated --

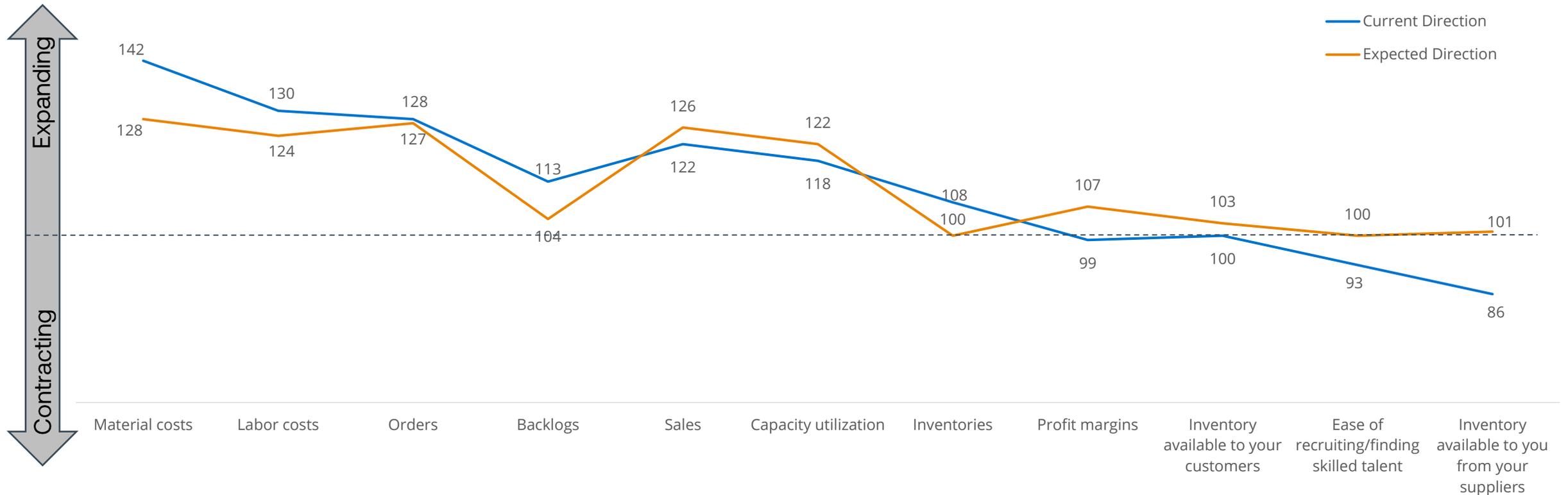


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The View from APAC



APAC: Direction of Key Business Indicators – Diffusion Index[^]
 -- Current vs. 6mo Anticipated --



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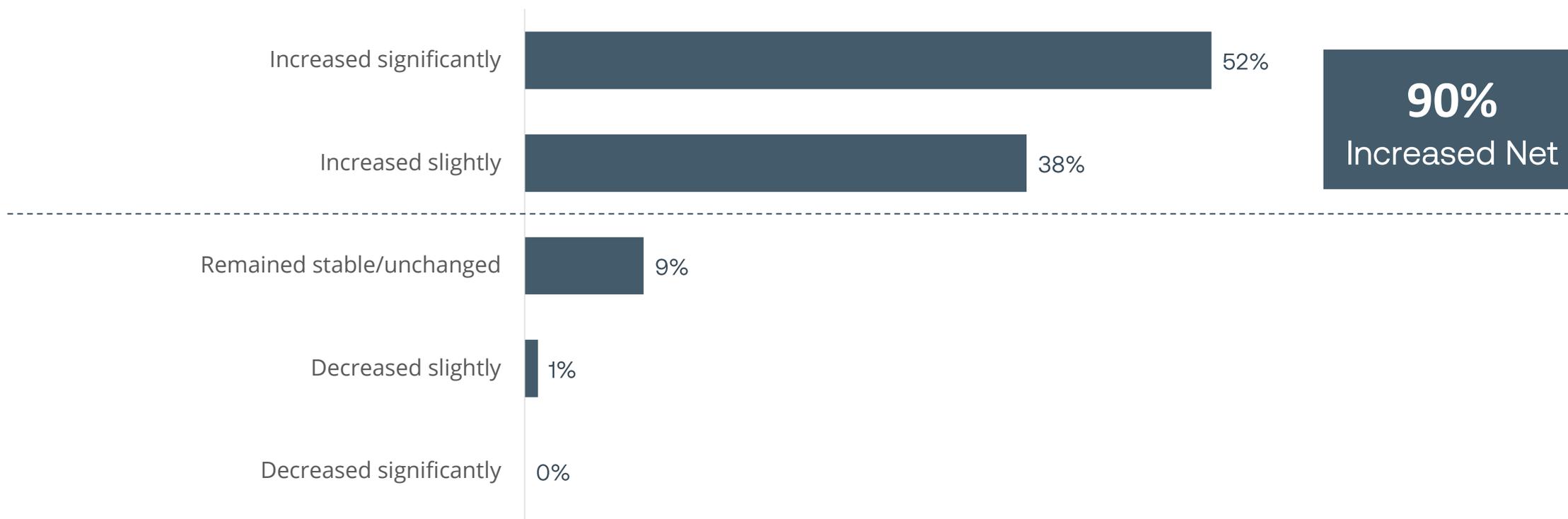
September 2021 Special Questions

The majority of manufacturers indicate the semiconductor shortage/other supply issues have resulted in increased price paid to suppliers



This increase is consistent regardless of region or industry segment

Extent to Which Semiconductor Shortage/Other Supply Issues Have Resulted in Higher Price Paid to Suppliers

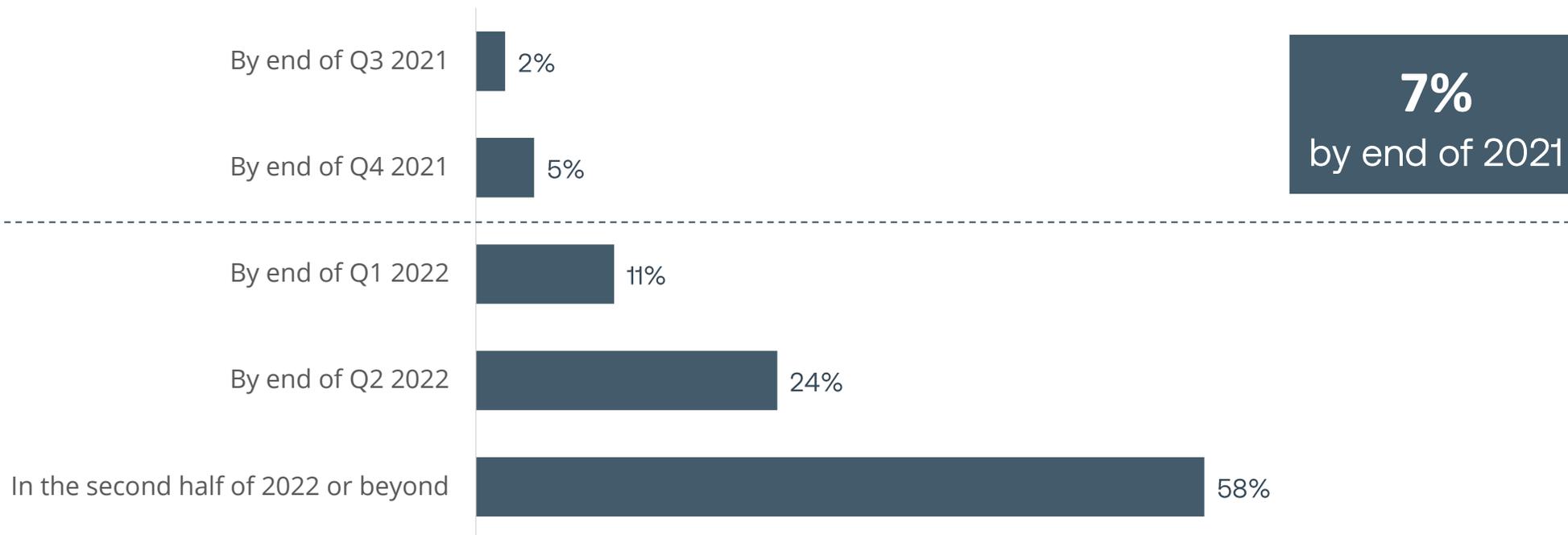


Manufacturers do not anticipate the current semiconductor shortage will be resolved soon



Fewer than one-tenth anticipate resolution by the end of 2021, with three-fifths who believe it won't be resolved until the second half of 2022 or beyond, with no differences by region or industry segment

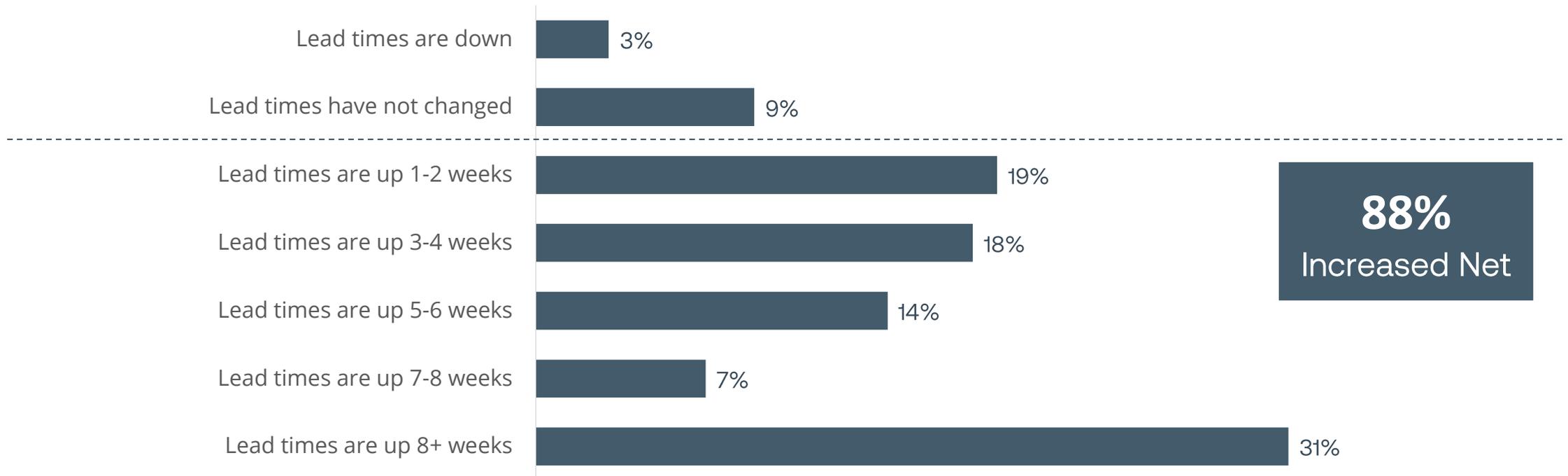
When Current Semiconductor Shortage Anticipated to be Resolved



Nine in ten manufacturers say lead times are currently up, with one-third reporting they are up 8+ weeks



Change in Lead Times

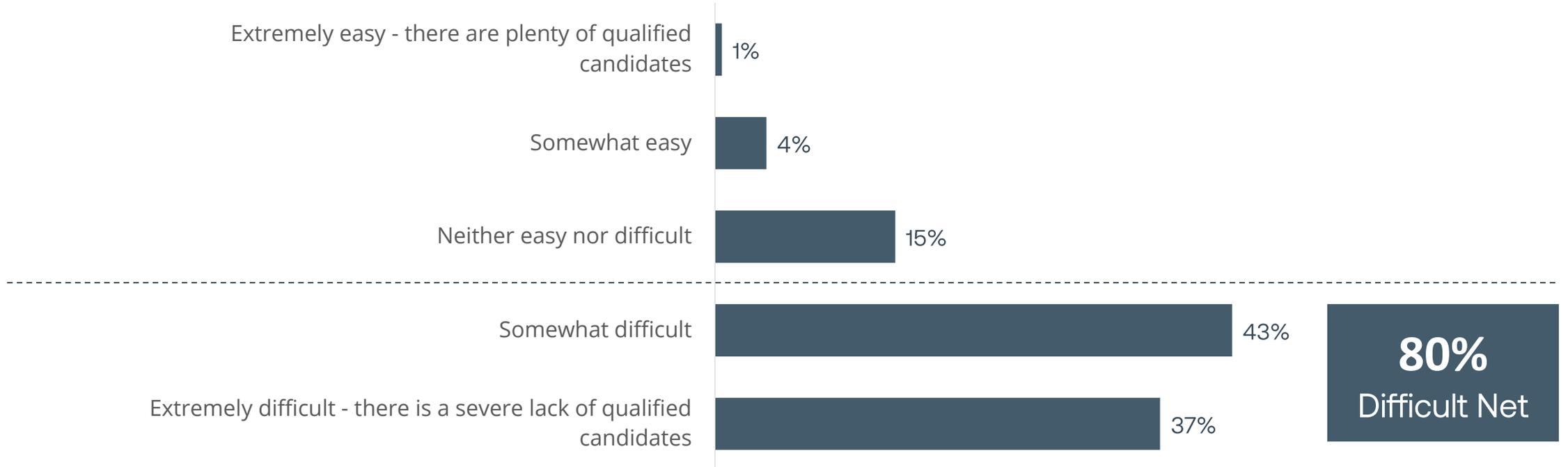


Four-fifths of manufacturers indicate it is difficult to find qualified workers, with approximately half of those experiencing extreme difficulty



Notably, North American and European manufacturers are currently experiencing greater difficulty in finding qualified workers compared to those in APAC

Ease of Finding Qualified Workers

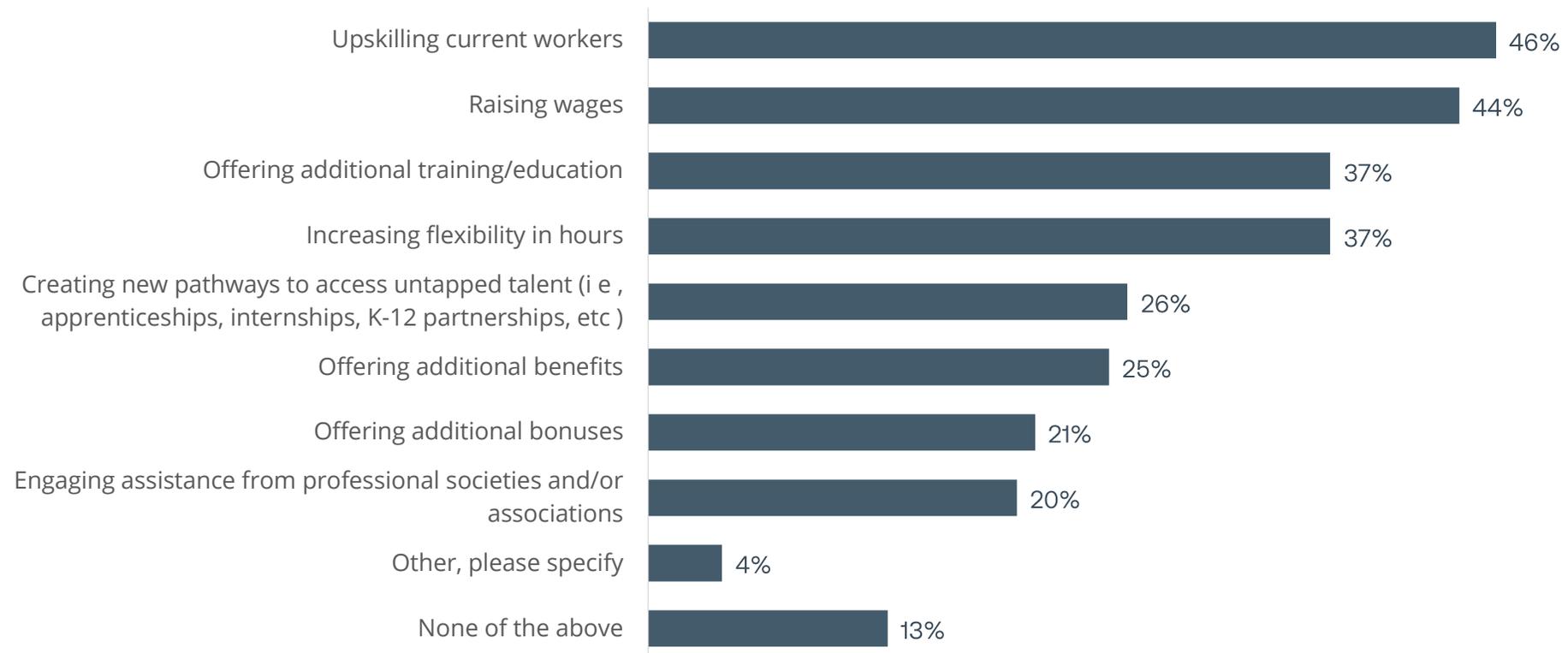


In an effort to attract more qualified workers, manufacturers are upskilling current workers, raising wages, offering additional training, and increasing flexibility in hours



Manufacturers in North America and APAC are more likely to be raising wages, with North American manufacturers also increasing flexibility in hours; wire harness and cable assembly manufacturers indicate they are raising wages and offering additional bonuses, with EMS also raising wages to bring workers in

Current Actions Being Taken to Address Worker Shortage



- > Each month, IPC surveys executives in the electronics manufacturing sector across the globe with the goal of assessing the current state of the industry.
- > The results contained herein are based upon the findings of IPC's The Current State of Electronics Manufacturing Survey, which was fielded between the dates of September 9 to September 15, 2021.



Questions? Please contact:

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