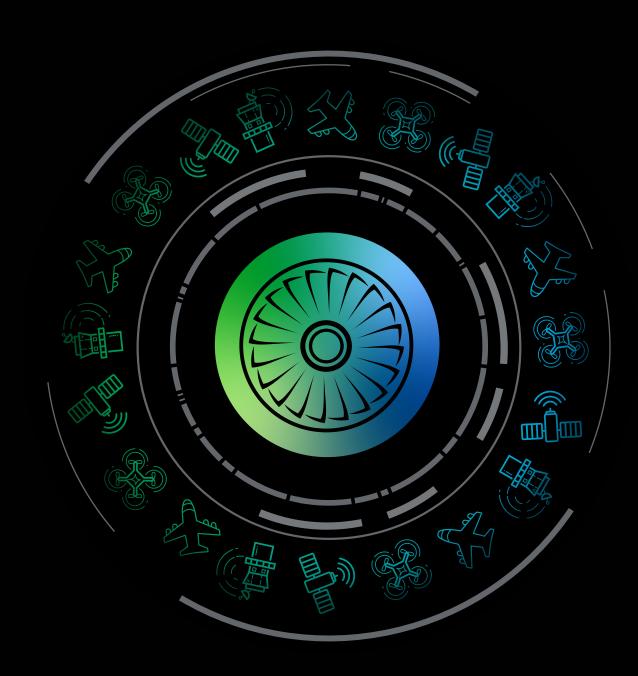
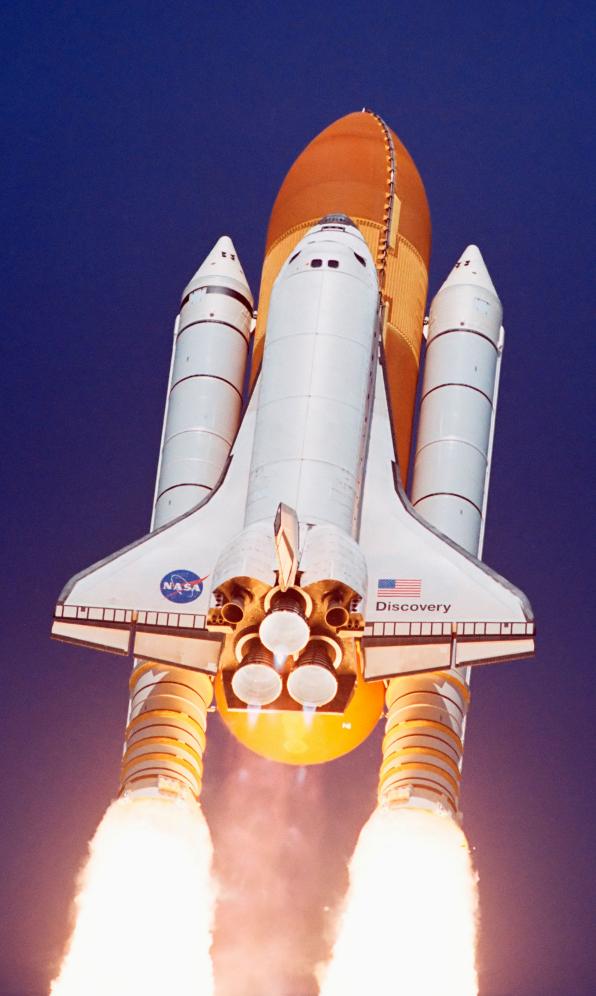
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2019 global aerospace and defense industry outlook

My take: Robin Lineberger





In 2018, the global aerospace and defense (A&D) industry recuperated and experienced a solid year as passenger travel demand strengthened and global military expenditure continued to rise.1 The industry is expected to continue its growth trajectory in 2019, led by growing commercial aircraft production and strong defense spending. In the commercial aerospace sector, aircraft order backlog remains at an all-time high² as demand for next-generation, fuel-efficient aircraft continues to surge with the rise in oil prices. With the aircraft backlog at its peak, manufacturers are expected to ramp up production rates, hence, driving growth in the sector. However, manufacturers could experience supply chain interruptions as some suppliers may struggle to increase production to keep up with the growing backlog. In the defense sector, heightened global tensions and geopolitical risks, recovery in the US defense budget, and higher defense spending by other major regional powers such as China, India, and Japan are expected to drive global defense sector growth in 2019 and beyond.3

Production ramp-up likely as commercial aircraft order backlog remains strong

The commercial aircraft order backlog is at its peak of more than 14,000, with about 38,000 aircraft expected to be produced globally over the next 20 years.⁴

Manufacturers are ramping up production to accommodate growing aircraft demand, and we expect aircraft deliveries to end 2018 with slightly more than 1,600 units, adding another 100 aircraft to deliveries in 2019.⁵ However, the demand for wide-body aircraft could further weaken in 2019 as there is already a robust wide-body backlog and airlines are deferring upgrades as they wait for more efficient next-generation wide-bodies. Also, with the introduction of 737-8 and A321neo, the capabilities of narrow-body aircraft have expanded, further impacting wide-body demand.

As we see original equipment manufacturers (OEMs) increase production rates, there remains a risk of suppliers facing difficulties in ramping up production. To overcome this challenge, manufacturers should consider deepening their focus on strengthening the supply chain, effective program management, and the use of advanced technologies to enhance productivity and efficiency.

With the rising demand for commercial aircraft, there are some new production programs emerging from outside the United States and Europe, especially from Russia and China. Though these new entrants could challenge the current duopoly in the longer term, there are several hurdles they would need to cross—procurement of orders from global airlines, managing cost and schedule overruns, certifications from regulators worldwide, and most importantly, establishing a safe and reliable track record—before they are widely accepted.



Resurgence of global military spending as geopolitical risks increase worldwide

Geopolitical tensions are continuing to intensify and demand for military equipment is on the uptick, driving defense spending across the globe.⁶

Since the beginning of the Trump era, defense budgets in the United States have been on the rise; and, the new administration's increased focus on strengthening the nation's military is expected to keep defense spending on the higher side in 2019 as well. NATO countries also appear to be focusing on increasing defense budgets to counter potential threats from Russia and the Middle East. Moreover, there has been growth in defense spending from other nations, such as India, China, and Japan, because of enduring security threats. Apart from this, heightened geopolitical tensions in the Middle East and North Korea are creating strong demand for military equipment, which is expected to be one of the key drivers of defense sector growth in the near term.

Although traditional threats (land, maritime, and air-based) continue to emerge, technological advancements and digitization have also led to cyber-related threats. To be prepared for the future, military strategies worldwide are evolving, and nations are aiming at integrating digital tools and technologies to manage both traditional and digital-age threats. This has resulted in a bigger focus on many cybersecurity programs, which are expected to play a vital role in the near term.

Moreover, space is becoming an important part of the overall defense industry ecosystem as growing global tensions could pose a threat to space assets such as satellites, which are often relied upon for military operations including surveillance, communications, and missile targeting. Because it has become important to shield these assets, this may lead to the militarization of space. The United States, China, and Russia have already begun establishing dominance in space, with other countries, such as North Korea and India, gradually following them.



Changes in the international trade agreements likely to disrupt the global supply chain and increase costs

Free trade is important to the A&D industry as aircraft and arms exports drive revenue growth, especially for companies from the developed world.

For instance, A&D is the leading net exporting industry in the United States, which generated a net trade surplus of US\$86 billion in 2017.7 But there is a possibility that brewing transatlantic and transpacific trade tensions could affect this as duties being placed on steel and aluminum impact companies' bottom lines. Import tariffs on aluminum and steel—key raw materials imported by A&D manufacturers in the production of aircraft, missiles, rockets, tankers, etc.—will likely increase manufacturing costs and impact profitability. Defense companies that primarily sell to foreign governments and rely on relationships could be more adversely affected. With retaliatory tariffs being imposed, some A&D companies could consider moving their manufacturing to avoid tariffs for products manufactured and exported from their home countries, disrupting supply chains and delaying deliveries. A&D companies operating in this environment of uncertainty will do well by nurturing long-term stable partnerships across the industrial base and managing their global supply chain relationships.



M&A activity to remain strong as pressure continues on suppliers to reduce costs and increase production rates

The A&D industry experienced significant mergers and acquisitions (M&A) activity over the last two years.8

OEMs continued to put pressure on suppliers to reduce costs and increase production rates, which, in turn, pushed many suppliers to consolidate for scale, cost-effectiveness, and higher negotiating power. This trend is likely to continue as OEMs focus on expanding their margins. Hence, the highly fragmented supplier base is likely to become more concentrated in the near term. We may also see some megadeals as bigger players focus on vertical integration. For instance, we saw a large aerospace supplier acquire an avionics and interiors manufacturer, and more recently, the merger of two major communications and electronics contractors—one of the biggest-ever mergers in the defense sector. Apart from this, large, prime contractors are expected to consider acquiring small to mid-sized companies to gain access to new technologies and markets.

The industry is likely to experience increasing M&A activity even when valuations of A&D companies are high and near pre–financial crisis levels. Specifically, the enterprise multiple—enterprise value (EV) on earnings before interest, tax, depreciation, and amortization (EBITDA) of the A&D industry—rose from 9.9 times in 2015 to 14.2 times in 2018.9



Regional outlook

Though A&D industry growth is primarily led by the United States, some of the other key regions that are expected to contribute to industry performance in the near term include China, France, India, Japan, the Middle East, and the United Kingdom.

While India and China will likely drive growth in both commercial aerospace and defense sectors, Japan is expected to be a key market primarily for the defense sector. Defense expenditure in France is also likely to expand as the United States encourages NATO countries to increase military spending to 2 percent of GDP.¹⁰ In the Middle East, defense spending is expected to recover as oil prices stabilize at much higher levels compared to the 2015–17 period. With respect to the United Kingdom, there is uncertainty around the impact of Brexit on the country's A&D industry, as a hard application of Brexit might lead companies to revisit their industrial strategies.

However, a strengthening dollar may boost the United Kingdom's A&D industry exports as they become more competitive, provided post-Brexit trade agreements with the European Union and other major trading nations are favorable to the United Kingdom.



Country/region A&D industry trends and outlook Over the next 20 years, China could require 7,690 new commercial aircraft worth US\$1.2 trillion.¹¹ China The country is the second-largest defense-spending nation after the United States;¹² however, China's military expenditure to GDP percentage is much lower than that of the United States. • China's 2018 defense budget grew 8.1 percent year over year to US\$175 billion, which is the largest increase in the past three years.¹³ • The country's defense expenditure is projected to grow in the range of 9–10 percent in the near future. 14 **France** France plans to boost its defense spending by 40 percent over the next six years as it aims to meet the NATO target of "2 percent of GDP" spent on defense by 2025.15 • The defense ministry is targeting to increase defense spending of approximately US\$2 billion per year between 2019-22 and US\$3.5 billion each year during the 2023-25 period.16 The 2019 defense budget is expected to be around US\$42.2 billion, up 5 percent year over year. Military spending in France is projected to increase by 5 percent per year until 2022.¹⁸ India • By 2025, India is expected to become the "third largest" aviation market and supply about 478 million passengers by 2036.19 • There could be a demand for more than 2,000 new aircraft in India over the next two decades, which would be dominated by single-aisle aircraft.²⁰ • The 2018–19 defense budget for the country stood at US\$43.8 billion, a 7.7 percent increase from the 2017-18 budget.²¹ Japan • Japan's passenger traffic growth over the next 20 years is expected to be sluggish at about 3.2 percent, much below the Asia Pacific passenger growth of 5.3 percent.²² • The country's domestic market is dominated by two major Japanese airlines, but their market share has decreased over the past decade.23 However, the recent surge in low-cost carriers (LCCs) is likely to drive commercial aircraft demand in the future.²⁴ • Japanese airlines are primarily aiming to increase traffic from the high-growth Asia Pacific region by collaboration with other airlines.²⁵ • Japan's defense budget for 2018–19 was up by 2.1 percent to US\$47.6 billion, marking an all-time high and the seventh straight annual increase; however, it remained below 1 percent of GDP.²⁶ Middle East • Over the 2018–37 period, passenger traffic in the Middle East is forecast to grow at 5.2 percent, creating demand for 2,990 new aircraft valued at US\$660 billion.²⁷ • In the Middle East, wide-body aircraft are likely to comprise more than 40 percent of the total aircraft demand over the next two decades, as the region primarily accounts for high-volume, ultra-long-haul flights.²⁸ • Seven out of the top ten countries with the highest military expenditure as a percentage of GDP are in the Middle East: Oman, Saudi Arabia, Kuwait, Jordan, Israel, Lebanon, and Bahrain.²⁹ • Though the pace of growth in defense spending by the two key countries in terms of defense expenditure in the region—the UAE and Saudi Arabia—has slowed, their defense expenditure is significant, and the region is expected to see mid-single-digit growth annually over the next decade. **United Kingdom** • The United Kingdom's defense budget of about US\$52 billion (£40 billion) is near 2 percent of GDP.30 • This budget could increase as a recent defense committee report recommended increasing the budget to 3 percent of GDP or US\$78 billion (£60 billion) to strengthen the country's armed forces, including anti-submarine warfare to counter possible threats from Russia.31 • As Brexit nears, there is uncertainty around its impact on the UK A&D industry—it may lead to disruption in supply chains and create new trade barriers as the country would renegotiate trade agreements with the European Union and other major trading nations.

Let's talk



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