

2015 global aerospace and defense sector financial performance study

Growth slowing,
profits improving



Executive summary

Revenue growth in the global aerospace and defense sector is declining, with growth at a pace lower than gross domestic product (GDP) growth.

Global aerospace and defense (A&D) sector revenues grew by 1.9 percent, adding US\$12.7 billion in revenues in 2014 to reach US\$682.2 billion. This is a decline from 3.2 percent growth in 2013 and 5.8 percent in 2012. Indeed, the overall sector growth was slower than global gross domestic product growth of 2.6 percent in 2014.¹ Although revenues in the commercial aerospace subsector continue to increase, defense subsector revenues continued to decline for the second consecutive year. Globally, the commercial aerospace subsector increased revenue by US\$23.6 billion in 2014, an 8.2 percent increase over 2013. However, this growth was offset by revenue declines in the defense subsector of US\$8.2 billion or a 2.2 percent decrease from 2013 to 2014. The key take away is that all sector revenue growth and more has resulted from increased revenues in the commercial aerospace subsector, similar to the last several years.

Commercial aerospace subsector sets new records for sales orders, deliveries, order backlogs, and revenues, but the growth rate is expected to edge down. Global commercial aerospace companies achieved the highest levels of the four key growth metrics in the sector in 2014. Sales orders grew from 2,858 in 2013 to record levels of 2,888 sales orders in 2014, while aircraft deliveries increased by 6.1 percent from 1,274 to 1,352 deliveries. However, the sector growth rate is expected to slow down to 3.0 percent, with a 2015 production level expected at 1,393 aircraft and 1,422 aircraft in 2016, for a

2.1 percent growth rate. The sector's 2014 order backlog grew by 14.4 percent and reached a record high of 12,175 aircraft, compared to 10,639 aircraft in 2013. At the current production rate, this represents a 9.0-year backlog of future production. Revenues grew by 8.2 percent, from US\$291.2 billion in 2013 to US\$314.9 billion in 2014. The Boeing Company and Airbus Group together added US\$6.1 billion in additional revenue in 2014, as a follow up to the US\$11.0 billion of combined incremental growth in 2013. Growth in demand for travel, especially in China, India, and the Middle East, as well as the need for more fuel-efficient aircraft continue to drive demand for new aircraft sales. Because of this continued demand for new commercial aircraft, it is estimated that over 34,000 jets over the next 20 years will be produced, with a value of over US\$1.78 trillion at list prices.²

United States (U.S.) defense subsector revenues continue to decline with the bottom expected next year. Defense subsector revenues in the U.S. have been shrinking or remained stagnant for several years with flat growth in both 2013 and 2012, and a 2.5 percent decline in 2011. In 2014, revenues in the U.S. defense subsector declined by 2.2 percent or equivalent to US\$5.4 billion. This is primarily due to the drawdown of large armed forces engaged in operations in the Middle East and continued declines in funding by the U.S. Department of Defense (DOD), the largest sector customer whose budget decreased by 4.7 percent in 2014.³ Of the top 20 defense subsector companies in the U.S., only six companies experienced revenue growth in 2014. The Budget Control Act of 2011 mandated a reduction (sequestration) of

Note: Due to rounding, numbers presented throughout this report may not add up precisely to the totals provided and percentages may not precisely reflect the absolute figures. Also, the total A&D sector revenues will not precisely match when commercial aerospace and defense revenues are added together. This is because many large A&D companies have corporate eliminations/others as input in their total revenues, which cannot be distributed among commercial aerospace and defense subsectors.

¹The World Bank, *Global Economic Prospects*, January 2015, <http://www.worldbank.org/en/publication/global-economic-prospects>.

²The Boeing Company, *Current Market Outlook (2014-2033)*, September 2014, http://www.boeing.com/assets/pdf/commercial/cmo/pdf/Boeing_Current_Market_Outlook_2014.pdf; and Airbus Group, *Global Market Forecast (2014-2033)*, September 2014, <http://www.airbus.com/company/market/forecast/>.

³Stockholm International Peace Research Institute (SIPRI), SIPRI Military Expenditure Database, accessed on May 2015, http://www.sipri.org/research/armaments/milex/research/armaments/milex/research/armaments/milex/milex_database.

defense spending by about US\$490 billion between U.S. government fiscal years 2012 and 2021.⁴ Although, the impact of sequestration cuts tapered in 2014, following the enactment of The Bipartisan Budget Act in December 2013, significant uncertainty remains concerning the overall levels of defense spending for future years.⁵ Law mandates future sequestration cuts. Unless the U.S. Congress changes it, procurement decisions could result in further reductions, cancellations and/or delays of existing contracts or programs. This is likely to adversely affect the revenues and cash flows of defense companies. However, it is likely that even with sequestration in effect, the DOD base budget will start to bottom out in 2016 with consumer price inflation (CPI) adjusted increases starting to take effect.

Profitability and margins continue to improve.

Operating margins have been improving in the A&D sector; 8.4 percent in 2012, 9.6 percent in 2013 and 9.8 percent growth in 2014. The sector added US\$2.2 billion in global operating profits, reaching a record US\$66.7 billion in 2014. Commercial aerospace grew earnings by 6.0 percent. Defense companies grew earnings by 5.1 percent despite the 2.2 percent revenue decline in 2014. Commercial aerospace margins were 10.2 percent, while defense companies were 9.7 percent in 2014.

Top 20 company revenue rankings increasingly reflect commercial aerospace subsector growth. In terms of 2014 sales revenue, GE Aviation has moved up the list to the seventh spot as both Northrop Grumman and Raytheon have experienced declines in sales revenue, falling to eighth and ninth spots respectively. Bombardier Aerospace has also moved up in ranking to the sixteenth spot ahead of Textron. Spirit AeroSystems has made an entry into the top 20 list with a 14.1 percent increase in revenues in 2014. The changes to the top 20 list of global aerospace and defense companies continue to reflect the rising fortunes of commercial aerospace players, including significant revenue increases in the supplier base, which has resulted from commercial aircraft production growth. Additionally, it depicts the impact of declining growth in global defense spending over the last few years.

The U.S. continues to outperform Europe in profitability. Average operating margins for the U.S. and European companies were strong at 11.4 percent

and 8.0 percent respectively. However, the U.S. showed improved operating earnings performance compared to the Europeans with a 9.8 increase in contrast to a decline of 2.0 percent from 2013 to 2014. This slower relative growth rate resulted mainly from continued below average operating performance by European companies compared to their U.S. peers. This brings into focus the challenge for European A&D companies to gain efficiencies in the cost and asset base and their comparative ability to rationalize assets and reduce operating expenses. In addition, within Europe, country specific defense budgets supporting the individual country industrial base may not be large enough to achieve competitive efficiencies and economies of scale in their cost structure.

Sector is becoming more efficient. The global A&D sector has experienced improved operating efficiencies, resulting in higher earnings and operating margins as noted above. Efficiency, defined as operating profit per employee among A&D companies increased from US\$31,898 in 2013 to US\$33,341 in 2014, a 4.5 percent improvement. Indeed, employment growth in the sector was flat in 2014, holding at approximately 2.0 million workers. However, there were marked differences between regions. For example, profitability per employee in Europe was US\$26,335, while in the U.S. this was US\$39,379, a 49.5 percent gap between the two regions. Interestingly, while overall revenue declined in the defense subsector, profitability improved due to a base of fewer employees, which significantly increased employee efficiency as measured by profit per employee. Commercial aerospace companies, especially large entities, increased concentration of their supply base, risk sharing with suppliers, and factory automation, all of which improved the profitability per employee metric. Based on these positive trends in productivity, A&D sector customers, such as airlines and their paying passengers, as well as the defense departments of countries, are likely obtaining more for less, thus creating financial value for shareholders, taxpayers, and the global economy.

A&D sector is becoming more commercial. Based on increasing fortunes in the commercial aerospace subsector and recent declines in the defense subsector, the overall makeup and character of the global A&D sector is becoming more commercial. In 2013, 56.5 percent of sector revenue was from defense, space, and security,

⁴The United States Office of the Under Secretary of Defense (Comptroller)/Chief Financial Officer, "Fiscal Year 2014 Budget Request and FY2013 Update," April 2013, http://comptroller.defense.gov/Portals/45/Documents/defbudget/fy2014/FY2014_Budget_Request_Overview_Book.pdf.

⁵ Ibid.

while 43.5 percent originated from commercial aerospace. However, in 2014, the defense share of the sector dropped to 54.0 percent, while commercial aerospace increased to 46.0 percent. This shift in sector concentration demonstrates a trend toward higher dominance by the commercial aerospace subsector, as well as the long-term decline of the defense subsector. Significant budgetary delays and constraints have resulted in reduced defense spending levels, negatively affecting the revenue growth position for the defense subsector. At the current rate of growth, the commercial aerospace subsector is expected to reach parity with the defense subsector in terms of contribution to total global A&D sector revenues for the first time within the next two years.

Propulsion, avionics and tier two suppliers lead in profit performance, while OEMs, aerostructures and services profit lag. Similar to 2013, profitability was uneven in the A&D supply chain. For example, engine and avionics suppliers demonstrated higher financial performance due to efficiencies, scale economies, and higher value integrated into their products such as increased fuel efficiency, improved reliability, and lower maintenance costs. On the other hand, government services providers that perform systems engineering and technical assistance and base and range staff augmentation for government agencies generated relatively lower operating margins. Margins at propulsion or engine companies were 14.4 percent, while original equipment manufacturers (OEMs) experienced 8.4 percent operating margins in 2014.

Key drivers of 2014 sector sales, revenue, and earnings growth. Financial performance in the global A&D sector can be largely attributed to the sales growth in commercial airplanes at Boeing and Airbus, with a book-to-bill ratio of 2.76 times. This is expected to drive revenues for the sectors for years to come. As these

companies add to their sales orders, the backlog of orders continue to increase, which has resulted in increases in production build rates, which are at an all-time high. Indeed, The Boeing Company and Airbus Group alone added US\$6.1 billion in additional revenues in 2014. On the other hand, as described earlier, the top 20 U.S. defense subsector companies have been on a downward revenue trend for several years, and in 2014 shrank as a group by US\$3.6 billion in revenues. Regarding profits, the U.S. has led the way with a combined US\$4.1 billion in additional operating profits. Figure 1 illustrates further the key drivers of sector financial performance in 2014.



Figure 1: Summary of key drivers of A&D sector revenue and earnings performance

Revenue:	In US\$ billion
• Growth of The Boeing Company and Airbus Group	\$6.1
• Contraction of the top 20 U.S. defense contractors	-\$3.6
• Growth of propulsion segment	\$3.0
• Growth of Tier one, Tier two, and Tier three suppliers	\$5.1
• Contraction from services segment	-\$2.0
• Contraction from electronics segment	-\$0.5
• Other*	\$4.6
• Total revenue growth	\$12.7 billion

Earnings:	In US\$ billion
• Increased performance of the U.S. defense subsector	\$1.3
• Increased performance of the U.S. commercial aerospace subsector	\$2.4
• Increased performance of European defense subsector	\$0.4
• Increased performance of European commercial aerospace subsector	\$0.9
• Other*	-\$2.8
• Total increase in operating earnings	\$2.2 billion

* This includes differences due to our commercial versus defense analysis, and current exchange rates used. Constant exchange rates have been used for the overall sector analysis. The sector figures include some companies from outside of U.S. and Europe regions from Brazil, Canada, Israel, Japan, Singapore, and South Korea. Companies from these regions are not included in the "U.S." and the "European" region totals, but have been included in "Other".

Source: Deloitte Touche Tohmatsu Limited's (DTTL) Global Manufacturing Industry group analysis of the 100 major global aerospace and defense (A&D) companies using public company filings and press releases. See methodology section for further information and definitions of financial metric, as well as company name, reports, and dates. Note that all figures are in US dollars.

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