Check 6 with Accenture – How 2023 & 2024 will be better & worse for A&D

AUDIO TRANSCRIPT

00:07 - 02:17
Michael Bruno
Hello and welcome to Aviation Week's Check 6 with Accenture. I'm Michael Bruno, executive editor for business at Aviation Week. You'd never know it from the gnashing of teeth, but the aerospace and defense recovery is almost back to pre-covid-19 levels. And believe it or not, pretty soon business in aerospace and defense could reach new highs with record commercial aerospace deliveries and record defense spending on research, development and production.

But if this is a recovery, nobody in industry seems to have gotten the memo. Supply chain issues remain top of mind, and so do concerns about price increases across the board. And neither are expected to let up in years to come. There are bright spots such as in MRO work and of course, passenger traffic levels continue to surge, proving that people worldwide still hunger to travel by airplane.

The clouds overhang in those areas too, including capacity constraints. But there is hope for addressing many of these constraints, and it comes in the form of generative artificial intelligence or Gen AI as it's called. C-suite executives are not known to throw money at the latest technological fad. But some people say Gen AI is more akin to a paradigm shift like the introduction of the Internet or semiconductors.

Rather than just a buzzword. And the technology is receiving a surprising amount of interest among aerospace and defense industry leaders. But how will companies make the move from pilot programs to needle moving corporate adoption? Well, just in time for end of year reviews and year ahead planning, Accenture's latest Commercial Aerospace Insight report addresses all of these issues and more.

The report also includes a proprietary survey of industry leaders. Today, I am delighted to get a chance to discuss the latest findings with two longtime friends and experts in aerospace and defense. John Schmidt, Accenture's Global A&D Lead, and Jeffrey Wheless, Global A&D Research Leader. John, Jeff, thanks for coming again and providing yet another report teeming with facts and survey findings.

02:18 - 02:19
John Schmidt
Thank you, Michael. Good to be here.

02:20 - 02:21
Jeffrey Wheless
Hi, Michael. Good to be here.

02:22 - 02:41
Michael Bruno
All right, John, let's dive right into it. Is 2023 going to be an up year, down year? And where are we on this recovery from the COVID 19 pandemic and all those Boeing 737 issues? There were a couple of years there of lost work. So, is this industry finally getting ahead?

02:41 - 03:10
John Schmidt
Well, thanks, Michael. As you say, let's dive in and get to the point. 2023 does look promising for aerospace. In fact, we're expecting to see 11% revenue growth. And this can be driven primarily by commercial and MRO. And actually, beyond that, we expect that momentum to continue and hit 2019 levels here to go by mid 2024. Airlines are profitable again.

Passenger traffic remains steady. So all things are looking strong for that to be what happens coming up in the next calendar year.

03:11 - 03:22
Michael Bruno
Jeff, 11% revenue growth, nothing to sneeze at. I mean, inflation is up, but not even that high and airlines are profitable again. So what's driving this turnaround?

03:23 - 04:06
Jeffrey Wheless
Well, Michael, I think it's a testament to industry resiliency.

And the aerospace turnaround is driven by OEM momentum. And with both Narrowbody and Widebody production up from last year. Airbus and Boeing deliveries are increasing 12 to 13% in the first three quarters of this year. And while we won't see the end of year deliveries that we anticipated earlier this year, we still may see over 1200 aircraft delivered by year end, and that exceeds 2022.

1100 plus deliveries and net new orders have soared. And surveys indicate that 81% are expecting stable revenue in the short term, with almost 90% of the executives we surveyed forecasting solid growth over the next two years.

04:08 - 04:30
Michael Bruno
Great. So undeniably positive results. And it sounds like the executives take you all at Accenture surveyed are genuinely optimistic about mid-term business growth, even more so than in the spring, when your survey indicated sort of a sense of caution.

But, Jeff, I also get the sense in your report that we're not exactly talking about irrational exuberance in the corner office here.

04:31 - 05:24
Jeffrey Wheless
The current survey shows more cautious expectations for 2023 deliveries, and this is reflected in third quarter OEM earnings announcements. In our survey, only 50% expect higher deliveries in the Narrowbody segment and 41% in Widebody, which is down from the April time frame.

And similarly, only half are anticipating higher 2023 deliveries of commercial aerospace products that go into the aircraft or into the MRO network, and that's a decrease from about 73% earlier in the year. And so that's showing a tempering but yet a realistic optimism, I think, as you're calling out and and as we discussed, 11% growth is both amazing and achievable.

But there's for sure a lost growth opportunity in that absolute growth. The growth could have even been higher than 11%

05:25 - 06:04
Michael Bruno
Hmm growth could have been higher. John, it's the supply chain, isn't it? Supply chain. Supply chain. Supply chain. You talk to a lot of people and we talk throughout the year. And you mentioned to me after the air show this summer that everyone you talked to talked about the supply chain and you couldn't even go one conversation.

And that was before we heard about the latest issues at Spirit Aerosystems with some of the 737 rework and the GTF powder metal issue at RTX. These issues are program management, not inflation and labor, which we'll get to in a moment. But this is like two steps forward, one step back in industry.

06:06 - 07:42
John Schmidt
Well, you're absolutely right. Our conversation after Paris.

I mean, every discussion I had at the air show talked about supply chain at some point. In fact, even at Dubai, where the kind of the big news of the show was really around orders, particularly Boeing orders still in the meetings talking about supply chain. And it's continuing to be a challenge and it's going to remain a critical issue in aerospace industry and, you know, executive confidence continues to seem to fluctuate month to month.

I mean, even since the shows having these discussions, you know, on issues like Boeing's production cuts and, you know, Spirit Aerosystems setbacks along with Pratt Whitney engine issues, they just highlight systemic challenges that we're going to need to overcome. You know, and having said that, you know some areas like forgings and castings are improving, but different categories seem to pop up on an ongoing basis as a headwind against even higher growth rates that Jeff was referring to.

You know, I think these challenges are going to persist until 2025, but the optimism that we're seeing coming back in the surveying is is a positive sign. And know at present, 72% of the executives are confident in their supply chain performance in the near term, anticipating eventual alignment with OEM demands. And I think that also means a rebound coming in the mid-term.

You know, that sets up for a greater growth capture. So at the end of the day, you know, as we kind of look at what's going on, the supply chain is settling out. One of the executives I was talking to a couple of weeks ago said that, you know, in this business year, they're chasing orders or chasing parts.

Well, right now we're chasing parts. So at the end of the day, supply chain, I believe, is going to be a top issue for the foreseeable future.

07:43 - 08:04
Michael Bruno
All right. I want to unpack more about what you're hearing in regards to the supply chain. And we haven't even touched on interest rates or labor and the many effects they're having.

Jeff, the entire aerospace industry continues to be battered by rising production costs and their knock on effects. Let's start with raw materials and labor. What did Accenture hear in the latest report?

08:05 - 08:53
Jeffrey Wheless
Well, aerospace continues to grapple with rising cost, raw material prices, like, for example, stainless steel of sort soared, doubling since September of last year. And while there might be short term stabilization in some categories, half of the executives we surveyed expect further increases in raw material costs over the next year.

And four out of five four see even further rises in the next couple of years. And I struggle with an analogy that price, combined with often long lead times, sets up for quite the roller coaster. I think that's what we're we're in store for. And as well, labor costs are a concern to similar levels with with half predicting short term stable labor related production costs. But almost 80% are anticipating increases in the coming two years.

08:54 - 09:41
Michael Bruno
I think that's really interesting. You know, you all are talking about the the executives. Your survey say they're rising costs and they expect them to keep going up. The labor and raw materials and other contract costs. And that, you know, in the macro economy, we hear about interest rates coming down.

So it's a little bit of the world you live in may not be exactly the one you read about in the front of the newspapers. So, John, what are aerospace and defense companies doing about these rising costs? We've talked in the past, you know, about the emergency responses from the pandemic like stocking inventory and just hiring whoever you could, maybe even off the street.

But there's this foreboding sense of reality that these issues are pretty stubborn and not going away. How do companies address this?

09:42 - 10:54
John Schmidt
Well, you're right. These are long term challenges. And so long term challenges are causing companies across the industry adopt various strategies. So we're seeing companies adding inflation clauses to their contracts with OEMs when they're down at the Tier one level or supplying up.

We're looking at companies that are integrating suppliers into the raw materials sourcing point at Raytheon Technologies, an example of this, but there are others. Some companies, like Association, are acquiring small suppliers, while Boeing is conducting monthly meetings with their Tier one companies to manage their supply chain risks. So you got even Embraer deploying employees to support their suppliers.

So larger companies are doing a range of things in sourcing dual sourcing their certifying new providers and in some cases certifying parts to be manufactured in new ways, 3D printing being one of those and and really thinking about how they build overall resilience in their supply chain through these different methods. So when you start combining different options around reshoring or sourcing supply automation, digitization and flexible workforces, all of that is being kind of roped in to what is really going to be solution set, not a solution to these long term challenges.

10:55 - 11:19
Michael Bruno
So part and parcel to some of the solutions industry leaders are exploring is Gen AI. As I said at the top of the podcast. Jeff, practically everyone surveyed in your report said they expect Gen AI to transform their company. That is an eye popping uniformity from a group of people not exactly known for hyperbole. What else did Accenture find in the latest survey results?

11:20 - 12:03
Jeffrey Wheless
Well, Michael, 81% of aerospace leaders expect Gen AI to start having a transformative impact within three years. And almost 60% told us that they're already exploring use cases where they can get that value. And as we all know, aerospace companies are really complex organizations with lots of functions and regulatory challenges. And so they told us that where they saw the value in terms of generative AI having an impact to be realized, and basically two thirds saw a strengthening the supply chain resiliency. And 70% believed it's going to be enhancing the customer experience.

12:04 - 12:11
Michael Bruno
John, are they looking to apply Gen AI everywhere or are there some places where it's not quite ready to make a major difference yet?

12:12 - 13:28
John Schmidt
Well, it's it's an interesting question. It's also worth reflecting that just over a year ago that Gen AI hit all of our radars, Chat GPT was released in November.

And, you know, suddenly you had this new new tool you can use that you can maybe help yourself write a birthday note to somebody or even go out and get suggestions on investment strategies or perhaps write a term paper, which I know is frowned upon these days. And there are new methods of catching people that doing that, according to my children.

But it was just a year ago. And so here we are today. And I'd say my discussions with executives recognize that there's there's a hierarchy in applying Gen AI you know, with supply chain being one of most promising functional areas. And while, you know, the survey will tell us 60% see benefits in accelerated innovation, you know, it's going to be a little bit more of a challenge when we start bringing in tools like Gen AI into manufacturing, which while it looks like a great target, probably is is very complex, as you know, from material sourcing to final assembly, the whole process in there, there's some kind of natural limits to at least what today's models are able to do in the short term and then even get into the regulatory challenges with doing some of those things as well. So it suggests that there's going be a much more focused strategic approach in leveraging technologies within aerospace and defense in the industry itself.

13:30 - 13:47
Michael Bruno
All right. So the Accenture report and survey talks about huge expectations for transformation within companies over the next three years.

So what should companies and their CEOs and CXOs be thinking of as they sort of stare into this generational shift? John.

13:48 - 17:06
John Schmidt
Well, Michael, that's a very short question for what is going to be a fairly long answer. You know, as AI and Gen AI, I become essential in aerospace, in defense industry. Your companies are starting on this journey, really need to focus on three things.

The first and foremost thing is actually around building responsible AI into their processes. Governance is a key. We found that 65% of aerospace and defense companies have established some sort of cross-functional AI Ethics Committee or team to help them manage top down AI implementations, which is good. But only 25% have an enterprise strategy developed by the Chief data and analytics officer, the Chief digital officer.

This is something that every company needs to be thinking about and addressing front up. First step. Second is data. You know how clean is your data? Do you have governance around your data? Are you in a position to be a part of a solution that leverages your data, for example, being an extension of meeting your customers digital twin or sharing data that supports production or supply chain?

That's the second thing that companies need to think about. And the third is around building a strategy. We see a lot of proof of concept going on, especially around Gen AI. And while there are some near-term benefits of scaling some of those, it would be smarter to have a strategy around the three different levels of AI, at least as I think about the first level of the AI automation.

The second one being, I'll call it regular AI and then generative AI. And when you think about automation, it's fairly mature. Right? We started working with clients to build automation factories over five years ago. We found incredible value in several functions, including engineering, administrative tasks that we were able automate to free up time for engineers to go do real engineering versus the administrative things that they were doing in the past.

And then we have regular AI, this is what I would call it, in other words, using computer science to help solve problems beyond or difficult for a human, thereby enhancing the human's overall effectiveness. That's what AI really does. And we've got many examples in supply chain as well as other areas less obvious, like first article inspection. We're using AI tools today to be able to improve throughput by over 30%.

Generative AI is the third element to this and using large language models to support redefinition of processes. This is where that transformation is really going to happen. As you mentioned, Michael, and as Jeff noted, 81% of executives expect it to have an impact in three years. There's another statistic we got through our surveying that said that 98% of the executives expected to transform the companies over time.

So yet not within the three years, but over time. So I do think we're going to see it as one of those inflection points in technology as as you talked about in your opening. 70% of those, by the way, expect to see the transformational impact happening within the next 12 to 36 months, which is actually a phenomenal number to me, that this is what the expectations out there for this technology. And it's across a range of functions really with a common denominator of being faster to market, finding new revenue sources think. But all the data being generated by our products today and then higher productivity. So bring it home. My long answer to your short question is first responsible AI, second data and third, is the AI strategy that builds from automation through AI to Generative AI.

17:08 - 17:44
Michael Bruno
Well, Gen AI may help our kids write their term papers, but there is no substitute for the real deal. I'm delighted to have John and Jeff join me again for another Check six with Accenture. Thank you very much, gentlemen. We are unfortunately out of time. Be sure to check out the new Accenture Commercial Aerospace Insight report and join us at Aviation Week again soon for another edition of Check six, which is available for download on iTunes, Google Play, Spotify and Stitcher.

Thank you for listening and have a great rest of your day.