GE Aerospace

Edited Transcript

GE Aerospace at Bernstein SDC

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MANAGEMENT DISCUSSION SECTION

Douglas S. Harned

Analyst, Bernstein Institutional Services LLC

Okay. Why don't we get started here? I'm Doug Harned, Bernstein's senior global aerospace and defense analyst. And I am thrilled to have back with us again, Larry Culp, CEO and Chairman of GE Aerospace. Larry has got a few things he wants to talk about first and then we'll go into a fireside chat. And I think, as you may know, you can submit if you have questions through the Pigeonhole link. But, Larry, let me turn it over to you.

H. Lawrence Culp, Jr.

Chairman & Chief Executive Officer, GE Aerospace

Great, Doug. Thank you. With that sound, I think everybody can hear me even in the room next door. Well, good morning. We appreciate the opportunity to visit with you for a little bit this morning. Doug, it's the second time we're here. So it's good to be back as a standalone GE Aerospace. So I thought what we might do is just give you a quick update as to where things stand here with the company at the end of May and then get into the questions that are always the fun part of the session.

As we think about GE Aerospace and the journey over the last 14 months, I think it's worth repeating that our purpose has really been front and center for us, every step of the way. And as you can see on the slide, the words here are deep and meaningful. Doug is very excited when we put this slide up. We invent the future of flight. We lift people up and we bring them home safely. And that last part is meaningful to us in no small part, because we have the better part of the million passengers in the air right now with our technology underway. That's one thing to talk about safety being front and center. But for a company like ours, what's critical is to operationalize that. And we'll talk a little bit about FLIGHT DECK, which is our proprietary lean operating model, which really gives us, I think, the wherewithal to walk the talk around SQDC, safety, quality, delivery and cost in that order every day everywhere. So there's a lot that we're proud of in terms of what has happened since we spun out on the 2nd of April a year ago. Really pleased with the effort and the momentum we have across 53,000 people around the world. But hopefully, as you see today, there's still a lot in front of us that we think is noteworthy.

We look at the company for some of you who may not be familiar with the story. We really think this is an exceptional business focused primarily on propulsion-related services and systems. As you can see, last year,

2024, we did approximately $35 billion of revenue. We had a very strong first year out as a standalone company. We think we have an incredibly resilient business, in large part because of the balanced exposure we have across widebody, narrowbody, regionals and in our military business. And I think you see that right smack in the middle here, maybe most starkly with that 70% figure. 70% of our revenue comes from repeatable, predictable recurring services. So we're out there with our customers. We're living with the product every single day. And we think that makes us better. We think that is in large part how we differentiate ourselves.

We operate in two segments, Commercial Engines & Services or CES, and Defense & Propulsion Technologies or DPT. Clearly, CES is the business that runs the overall franchise. $26 billion last year in revenue, up 13%. And here we really have, we think, the enviable position of powering three quarters of [ph] varied (00:03:52) commercial departure around the world. So that speaks to the installed base in excess of 45,000 engines across that portfolio and a business that we think gives us exposure not only to customers realities today, but how they're thinking about what comes next and with the larger service percentage here, nearly three quarters of revenue. Again, we're out there every day and this is where we see real strength frankly. We talked at earnings back a little over a month ago, about a 30% orders growth in services in CES last year. We continued at that pace in the first quarter. And as we look out today with respect to the demand environment, we continue to be encouraged by that.

But it's not just the aftermarket. It's not just supporting the installed base. There's a lot going on here with respect to growing the installed base. You've seen a couple of noteworthy orders here of late. We had the good fortune to be with the president when he was in Qatar just two weeks ago, announcing the largest widebody engine order in our company's history in excess of 400 engines with Qatar. Around that same time, we were thrilled to win the nod to power 32 new Dreamliners, the 787s that British Airways will be buying from Boeing. So there's just a lot of momentum here as the fleets are being worked on a daily basis, but also as the airlines look to modernize and expand their fleets.

Not dissimilar dynamics in Defense & Propulsion Technologies. The smaller business you can see approaching $10 billion in revenue. We had a good year last year, mid-single digit growth with a backlog now quickly, well, now in excess of $10 billion. We're closing in on $20 billion. This is where we really have a similarly enviable position in that we power two thirds of the US combat jet and rotorcraft fleets. So our engines are out there. We've won platforms over the last several decades, which gives us that installed base of here 25,000 engines, which we're out again servicing on a regular basis.

We are off to a good start here, a little bit more of a profitability emphasis in DPT. And we saw profit up in the first quarter of 16%. When you put it all together, a lot of momentum here in large part because of the installed base and the activity on both sides of the aisle. But again, also with a backlog overall in the $180 billion range, a lot of commitments that we're looking forward to fulfilling in the years ahead.

So how do we do that? Which really capture here, I mentioned FLIGHT DECK earlier. When we think about our strategy, simply put, we want to be the company that defines the future of flight, and that really requires us to be focused strategically on what we're doing today, tomorrow and into the future. When we talk about today, it really is all about servicing the ramp. This backlog around services that we mentioned earlier, the expansion of the fleets around the world and at the same time making sure that we're doing the same thing for our military customers that we are with our commercial customers.

With respect to tomorrow, because we're sold out in many respects through the rest of this decade, it's all about building out the capacity and the capabilities, be it a new make, be it in the aftermarket to make sure we're prepared and all the while continuing to evolve and advance the products. Time on wing really the hallmark of any

outstanding engine platform. There's a lot that we're doing to make sure in narrowbodies and widebodies and even in defense that we're continuing to progress to improve the time on wing that improves in turn the overall performance and economics for the airline.

All the while, as challenging as that is operationally, we need to make sure we continue to focus on the future of flight. We're fortunate to be here today because of the good work so many have done in the generations really that preceded us when we hand this business off we want to make sure we're well-positioned strategically on the platforms that matter around the world.

FLIGHT DECK in turn is how we make that strategy a reality. It's how we implemented it to our operating model. And it's really all about behaviors that we expect from everybody on the payroll coupled with lean operating fundamentals, which allows us to do a better job for our customers on a regular basis throughout the course of the year. And in turn, that's what you see on the far right, the results that we drive, the operating results, first and foremost, the financial and in turn, our Hoshin Kanri, our strategic breakthroughs as well as our culture. So there's a lot here, we don't have time to unpack it all. But I think the main takeaway here is that we care deeply, not only about what we're doing, but how we do it. We think the how is critical. It's what makes us sustainable. It's what makes it valuable for customers and investors alike. So we spend a lot of time on FLIGHT DECK when we're back in the office.

I mentioned the future of flight. A lot happening here. And on the commercial side, we'll be in Paris in a couple of weeks talking a lot about our RISE program, which is really a technology effort across multiple elements, our open fan rotor design, our compact core, everything that we're doing in hybrid, electrics, sustainable fuels to make sure that next generation aircraft, particularly in the narrowbody segment has GE under wing. And when you think about the fact that we're spending $3 billion a year in R&D, you might think, well, that's a lot, 6% to 8% of sales, right where you want to be. We don't think about it as a 12 month spend, right. Just as importantly is that $3 billion that we're spending, consider that we have in excess of 1.5 billion of flight hours of experience. And it's that experience is those reps coupled with the spend, coupled with the talent that we have that really has us excited about being able to define the or to invent the future of flight, particularly with the RISE program in next generation narrowbodies.

But there's plenty to do on the defense side as well. We've talked in the past about our XA100, the adaptive cycle engine that completed its test campaign just last year. We're excited about the thrust and the range capabilities that that engine offers and that's really given us the platform to pursue our XA102 program, which is tied to the Air Force's Next Generation Adaptive Propulsion Program. So as you think about everything that's happening in six generation combat, know that GE Aerospace is actively investing, actively involved with the customers to lead and invent in that realm as we are on the commercial side.

I mentioned earnings just about five, six weeks ago. At the end of April, we were pleased with the strong start to 2025. As you can see on this slide, we held our full year guidance, which we were pretty proud of when we laid it out all the more so in April, and we did that knowing that there are more macroeconomic uncertainties out there today. And I don't think we're going to change our view materially in that regard. But we're off to a good start here. In the second quarter, demand has been pretty much in line with what we would have anticipated. And maybe just as importantly as we have been working our way through the supply chain challenges, we're really encouraged by what we've seen FLIGHT DECK help us do, especially with our supply base, which will really pace not only our deliveries of new make engines, but also the completion of shop visits, the delivery of spare parts and the like. We really manage this less on a quarter-over-quarter basis, on a year-over-year, more on a sequential basis.

And a lot of what we've done with FLIGHT DECK putting the right tools in the hands of our engineers to go out in the field, work with our critical suppliers that tend to pace us has really yielded some nice results. We were doing this a bit by force, admittedly, in 2024, we've changed our organizational structure, put in a new team, which we call Technology and Operations, really bringing quality engineering and supply chain together under one roof, putting the FLIGHT DECK tools in their hands. And in turn, we're seeing real results. The results that matter most for us really are, frankly, deliveries. And just see here in April and May a double digit increase sequentially in deliveries from those critical suppliers is very gratifying. All the more is the increased certainty that we see in those deliveries. The suppliers that have been our focal points are now delivering to us 95% of the time to their commitments, and that's well over twice as much as they were doing a year ago. So we're getting more and we're getting more in a predictable fashion that really sets us up, I think, at least here in the second quarter, to have very strong year-over-year improvements, particularly in CES.

So a lot still to do. We've talked about the headwinds given some of the trade and tariff dynamics. There are a number of things that we can do within our own operations to limit that exposure in earnings. We said that would leave us with about $500 million of headwinds in 2025. We said in turn between cost and price actions, we intend to offset that. And that's really why we were able to hold the guide as opposed to perhaps take it up despite the strength that we saw in the first quarter. We'll go through 2025 in more detail in two weeks when we have an Investor Day at the Paris Air Show. Welcome, everybody, to join or dial in but a lot in addition to an update here that we're excited to share with everybody in Paris.

And then just to wrap up here. A lot has happened over the last several years at GE. A lot has happened over the last 14 months at GE Aerospace. But we really believe we are still poised to soar as a company. What you see across this slide, we think, are really the critical elements of the competitive advantages that we enjoy. We power most of the customer-preferred platforms, again across both the commercial and the military segments. Our products deliver the highest operational reliability in large part because of the underlying technology coupled with FLIGHT DECK. And again, that operational reality is paramount for airlines. That installed base tally up the two figures I cited, 70,000 engines around the world, again, give us a solid foundation exposure to what the customer needs every day. And that recurring predictable revenue stream, a 1.5 billion hours of flight experience coupled with that R&D spend, allows us to push the envelope to really drive breakthrough innovation and then again, finally, with FLIGHT DECK, we really have an operating model that allows us to operate as one team, implementing one strategy with an integrated operating model to serve our customers as best we can.

So, Doug, that's a little bit of an update, a little bit of an overview on GE Aerospace. Over to you.

QUESTION AND ANSWER SECTION

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Great. Thanks, Larry. When I think back, you mentioned last year you were here with first time here as GE Aerospace CEO. And we talked about how it would differ from your history running a multi-industry company either GE, Danaher and how have you found this, if you look at the last year in terms of what you personally focus on? And are there any things that when you look back possibly could have done differently?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Or better, right? I had 14 years as CEO at Danaher. And even before I became CEO, I was involved in different aspects of the portfolio in the GE job. Right from the jump back in October of 2018 was similar. So rather than being in multiple sandboxes, I ended up last April in one and I had not done that since really the mid-90s. So I had to make sure I was ready to do that. So far so good I think. But the change really is all about the depth that you were able to pursue on almost any topic. And for me, being able to spend more time with our customers and more time with our team has been invaluable. And I just see Doug as I begin my second lap at GE Aerospace, I know things, I understand people, be they people on the payroll, people in the marketplace a lot better. And that informs decision making.

If there's one thing that I would have done differently last year, it would have been to have accelerated the implementation of this Technology and Operations organization I mentioned earlier. I think we had to go through what we went through in 2024 really to force more collaborative, deeper, more technical, more action-oriented problem solving in the supply base. There's a lot of history, a lot of past practices that we have been working to improve. But I think we're seeing while it's early, I think we're seeing a step function improvement in our collective ability to go out and work with suppliers to identify and solve the operational bottlenecks that they may have. And there's no one bottleneck out there. A lot of people say, what's the one thing you need to solve for? I wish it was just one thing, right? It's 1,000 and it changes, but we're far better in the field now. I think over 500 people forward deployed working with suppliers, large and small. Some names you know, some names you've never heard of that are just critical to our ability to ramp. So glad we got after that in January. I love what we've seen so far this year. I just wish I had the insight and the perspective done that maybe last summer. But we move forward.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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You mentioned this, in fact we talked about this on the earnings call in terms of, you've been engaged with the administration and providing a point of view on tariffs. You talked about the $500 million estimate you made. Now, you've just been on this trip in the Middle East with the president and his team. When you think about that, clearly more engagement, both on the order side and on probably a better understanding about how they're thinking about tariffs. After all of that time, how has your perspective shifted on where GE Aerospace is going vis-à-vis where the administration is going?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Well, I would say well, let's take those in that order. I would say from an orders perspective, we were gratified to be part of the president's state visit to Qatar, our signing with Qatar Airways. I'll say ours. Kelly Ortberg was there with us representing Boeing. I mean, that was just a wonderful moment - more than 400 engines for us to have that sort of visibility. But in the run up and this was not something that came together on the flight over, I would just give the administration tremendous praise for how supportive they were over time on an interagency basis. And I don't think GE Aerospace is the only US company that has strong support from the current administration, and that matters when we're competing outside of the US, when we're competing with other companies. We've long seen other governments in full support. So to have that sort of engagement again across many principles was helpful. And we're thankful for it.

From a trade policy perspective, I'd just step back, we've said this publicly, we've said it internally, we strongly support the direction that the administration is taking with respect to trying to revitalize US manufacturing. No one is more invested in US manufacturing, competitiveness, innovation and the like than GE Aerospace. When we've sat down with the administration, what we've tried to articulate is that unlike many sectors of our economy, aerospace is unique. Aerospace enjoys a $75 billion annual trade surplus, and that's largely on the back of the 1979 Civil Aviation Agreement that allowed for basically tariff-free trade in both directions across the Atlantic.

And in many ways, that, I think is the objective of the America First trade agenda. We've drawn that parallel in advocating for a return to that arrangement. I think as we go forward, we're going to see a number of bilateral agreements. We saw what happened with the UK, for example, and we're going to be full throated in our support of a return to a tariff-free aerospace arrangement that will allow our company and others to compete on a fair level playing field internationally. That's obviously been something that we have been able to manage well, witnessed the Qatar order, witnessed the DA order and we want to continue to operate in just that fashion.

Doug, as to an outlook, it's hard for me to say. But, again, I think we have – we've had a number of meetings with people across the administration, and I think they understand how unique and important aerospace is. So we're optimistic about that outlook.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Great. When you look ahead, you've described a growth rate, I think 2025 to 2028 within Commercial Engines & Services of something in the high-single digit range. You've been growing faster than that. Is that still a good number? I mean, how do you see that breaking down between OE and the services portion of the business?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Well, I don't want to give away everything that we're going to share in Paris, but I think we're well aware that we've gotten off to a very strong start here. And with the backlog I mentioned earlier, we think we can continue to grow in that ballpark. We'll fine-tune that for everyone when we're together in a couple of weeks here in Paris. And again, it's really a function of what's happening with utilization of today's fleets and the airline's efforts to expand and modernize. I share that framework again, because that's really the way we think about the second part of your question, Doug, in terms of new make versus services. Services will continue to be strong even as departure growth moderates in large part because we see some of our legacy platforms like the CFM56, like the GE90 being stronger for longer. We see work scopes expanding. We're getting a little bit of price. You put all that together. What's happening in the aftermarket is quite good for us right now. We think that outlook, as far as what we can see in the future remains robust.

New make will probably as we ramp here, grow a little bit faster than what we've seen in services, just as the supply chain improvements that we've been talking about really take root. We know we've got airframers, be it Airbus, be it Boeing, others that are very keen to move at accelerated clip to service their own backlogs. We're gratified to be under wing. That'll create a little bit of margin pressure for us. We've talked about that just in terms of the new make versus services margin structure, let alone some of what we know we're going to be working through in terms of the introduction of the 777X at Boeing with our 9X engine under wing and some of those platform-specific issues. But I think on balance, we feel very good about the outlook top line for the rest of the decade.

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace
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Well, tied into that, if you look at how services and OE sales go forward, you've been targeting 25% margins at CES this year. But as you look out, you've clearly got some pressure on the OE side as it's a good kind of pressure as fleet deliveries hopefully go up. But how do you foresee margins evolving given that LEAP growth at lower margins and your very strong services business?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace
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Well, I think that when we look at the margin structure in CES in particular, really is a function of the very strong growth that we're seeing in services and in turn the operational improvements that we're driving, productivity delivery on the back of FLIGHT DECK. I think with respect to the headwinds, it really is worth noting that as we bring the LEAP forward is we increased the LEAP share of departures, We will see a little bit of pressure in that regard. I mentioned the 777X introduction as well earlier, but we think we're going to continue to grow our margin dollars in CES. We think that's what matters most. And to the extent that we have that robust demand outlook that I highlighted earlier, we think we'll work through those headwinds, including the headwinds we touched on with respect to tariffs as we move forward.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC
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And you're contrasting margin dollars with margin percentage more or less, even if there's some pressure on that percentage margin, the dollar?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace
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We want to grow both. But I think what matters most clearly is going to be the dollars.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC
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Now, you talked a lot in the past about the supply chain challenges you've had on the OE side, certainly on LEAP deliveries to Airbus. Can you talk about where that stands now and how your trajectory is looking as you look out for the rest of this year and beyond?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace
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Doug, I would say that we knew that we're going to have a slower start than any of us would have wanted in 2025. But what we shared back in January in terms of LEAP deliveries growing in the 15% to 20% range, continues to

be what we believe we will do in 2025. It's all about the supply chain dynamics. And again, with what we've been doing with FLIGHT DECK with the supply base, we're really encouraged by the sequential improvement that we've seen in our deliveries from our critical suppliers. For us to be up so early in the quarter, April, May, sequentially compared to where we were in the first quarter even when you maybe discount that a bit for a slow start in January, very optimistic, maybe as much as the numbers fuel that optimism, the underlying work that's delivering is undergirding that really is helpful. So we've got a good bit here to still do in June, but we think that sets us up well, not only for the second quarter, but if we are able to build on that momentum through the back half of this year, our LEAP deliveries and everything else around that right, be it other engine platforms, the aftermarket and the like, should continue to improve as we work our way through the calendar year.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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At the start when you were talking about these two, these big new orders that you're getting, one of the things that looks so challenging, it's not just you, It's Airbus, it's Boeing, it's Pratt, it's everyone is taking in like a huge order, like the Qatar order or even adding in some of the narrowbody orders, are those slots available? I mean, you don't have them for engines. Boeing and Airbus don't have them given their profile. So how do you think about when you work these deals, adding those in to your delivery flow?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Well, I think that's critical and the customers are well aware of that slot dynamic as well. And I think that's why you've seen some customers maybe postpone orders until there's maybe greater clarity. But so many others saying time is not our friend here. We better get in line. Given the scarcity value of those grabs slots and in turn the engine slots. So when you look at any large new order, unless there's a small gap, someone is looking to fill in their skyline, you're probably talking about a delivery year with a three handle.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Yeah.

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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I think the way we think about it, Doug, again, back to that today, tomorrow and future construct, we have a lot that we need to take care of here in 2025. That is paramount. But as we look forward to 2026, 2027, 2028, there are things that we need to be doing now. Recall, this is the ultimate long cycle business. There are things that we need to do now in our own shops with our supply base to make sure we're building in the capability and the capacity for those sequential step ups in 2027, 2028 and 2029. But the good news is because we have that backlog booked to the extremes in line with Airbus in line with Boeing, those are the tasks the teams are tackling on a daily basis.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Now, on the LEAP, if we go back away, there are a number of issues you had, the engine, radial driveshaft and the fuel nozzle coking, HPT blades. I know those have largely been resolved and the latest appears to be your new maverick blades on the HPT. Can you talk about how much improvement you expect that to provide for the LEAP?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Sure. And again back to that last slide we talked about, operational reliability is critical for our customers, right? They want to be able to dispatch. They want to be able to complete those missions on a regular, predictable basis. I think, we pride ourselves tremendously in our time on wing, which is really the way we measure how well we're doing over the course of time. I think if you step back for a moment, Doug, we'll talk about LEAP in a moment. If you think about the way we go to school on our installed base, the way we learn from that over 1.5 billion flight hours, the GEnx is instructive. Again, the engine on the 787. When we launched since we've launched that, I think we've increased the time on wing two and a half fold. So we're up, I think, in harsh environments to 4,000 cycles, in neutral environments up to 6,000 cycles. So a significant improvement post entry into service as we continue to drive those product enhancements.

Doug, just rattled off a number of things that we've done with the LEAP, and that's really the model that we deploy. We want the engines to be as robust as possible at launch, but we know there are going to be things that we will be learning and in turn addressing early in the lifecycle. If we look at the LEAP, I mean LEAP is coming in to, what, 10 years since EIS. The pandemic created a bit of a double launch there. But as we have gone through, particularly with the improvements that we have put in on the LEAP-1A here, they were approved to be in the last year we've been implementing them here this winter and spring. We see another improvement in our field performance capability. So we're going to take the LEAP from about 3,000 cycles to 8,000 cycles.

So we're going to more than double the time on wing with the LEAP. And that gives us, we believe, performance parity with the CFM56, which is the predecessor engine platform on the narrowbodies. And that's really what the customers want, right?

Customers understand we're going to go through a bit of a transition with the new engine, but when they think about the dispatch reliability, when they think about fuel performance, their benchmark is the CFM56, we enjoy being that benchmark. And now with these enhancements that we're talking about on the LEAP, we think we put the LEAP right in that same performance zone that's what we ship today with new engines. It could be a multiyear field retrofit program obviously, but we feel very good about that. But again, not done in either instance we want to continue to learn and continue to improve what we do for our customers.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Now, Boeing appears to be on a recovery path with respect to the MAX, you may hear more from Kelly, more on that. But when you look at it, you've delivered a lot of LEAP-1Bs to Boeing. And so they've got all they need right now for production in terms of engines. So when you look though at the future for GE Aerospace and the LEAP-1B as Boeing ramps up, how do you plan for that? In other words, right now you're still delivering but in theory, in a normal environment, you would be delivering at a lead time pretty much in sync with their rate. So how do you think about that engine today?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Yeah. Well, I think that we spent a lot of time in concert with Boeing. I trust Kelly will attest to this, not only looking at deliveries for May and June of 2025, but how do we step up as they step up, right, in 2026, 2027 and beyond? They came in to the year, I think it's been well-documented with an inventory position of engines and other elements as well. As they ramp here, and Kelly, I think, has indicated that they're going to be at rate 38 here before too long. They're working their way through that inventory. We want to make sure that we are completely in

sync with them as we move forward. I touched on some of the improvements that we need to see through to deliver that 15% to 20% year-over-year increase in deliveries of LEAPs at large. We won't get into the 1A versus 1B here, but I think we feel very good about the way we are collaborating with Boeing, the turnaround underway both operationally and otherwise. And we just want to do everything we can to support that ramp, not only on the MAX, obviously, the 787 as well down in Charleston. And that's what we spent a lot of time doing.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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So one of the big issues airlines have faced and it's kind of across the board is very long induction times into MRO shops and actually slow throughput many times because of shortages of parts. I know availability of parts has been an issue for you. How do you see this? And I'd say both if you look at the LEAP and actually also for CFM56, if you compare those two profiles and what you need to do to improve it.

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Yeah. We talk about delivery so often, Doug, as you know, people will focus on new make deliveries. How many planes that Boeing or Airbus deliver, how many engines that GE Aerospace ship, but just as important is the turnaround time in our shops, be the shops we operate or be the shops our partners operate. And we really haven't, I think, been thrilled with the progress we've been able to demonstrate. We see a lot of underlying improvements operationally. Again, back to FLIGHT DECK where we're in there rooting out a lot of the process waste that consumes time, non-value-added work. But we could strip all of that out. But we don't have the parts, right, even if it takes a day to do a shop visit, we're not going to able to bring those turnaround times down. But we are seeing, in a number of our widebody shops, the turnaround time curve bending. So we're getting back to double digit turnaround times encouraged by that, a long way to go. Again, FLIGHT DECK is helpful in that regard, both in our shops and with respect to how we're deploying that with our supply base.

Again, when we talk about what we're doing with suppliers, the same suppliers that we use in new make support us in the aftermarket. We're also trying to leverage AI where we can, right, to the extent that we can put to better and higher use these incredible data sets we have about engine performance to anticipate what a particular engine may need in terms of parts ahead of that shop visit, ahead of the engine's arrival. We're more likely to have everything in hand to complete that shop visit in as quicker time as we can. So work to do on the narrowbodies on the CFM56 and the LEAPs. We think we know what we need to do here. We just need a little bit more time to be able to have those improvements read through to what customers' experience.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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And I know one of the most important things for you is the expansion out and the greater use of third parties, third party MRO. And that, of course, you're providing the parts for that. So there's potentially the same types of bottlenecks. Can you talk about how you're thinking about the evolution on the LEAP to more a third party maintenance? And this is really just starting now unfold.

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Right. And, I think what Doug is talking about a little bit of the risk transfer dynamics through the lifecycle of an engine in service. I mean, early on, it's a big commitment for an airline. They know there's risk back to some of the performance issues we talked about earlier. They'd like to put that risk to us as the manufacturer. We've taken

that on, we've priced that accordingly and managed it. And that has helped us I think, drive the market shares that you see us enjoy today. But it also helps us set up the aftermarket economics through the lifecycle of that engine.

Another thing we've prided ourselves in is having an open network. Through the course of that engine's lifecycle we don't want necessarily to have the airline be captive to having that work done inside of a GE Aerospace shop. We want them to be able to, if you will, shop to work, which is why our third party network is such a point of pride. Early on here, a lot of that work will be done by us. That's okay. Frankly, it accelerates the learning for us, but these third parties, especially for LEAP now, as Doug is alluding, we're seeing our third party partners come in line. I think we saw like over 10% of our LEAP shop visits done here recently by third parties. That's going to continue to with a step up. It may break into thirds over time, right? We may do, call it, a third, Safran may do may do a third, and we may have third parties pick up some of that or maybe a little bit more, we'll see how the market shapes the evolution. But we like the fact that we don't have to necessarily capitalize the entire footprint over the engine's lifecycle. And in addition, we think that open -that non-captive market is good for the customer.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Yeah. Well, as you look on the CFM56, certainly that service business is hugely important for you. We continue to see life extensions, fleets getting older and older and they're staying out there a long time. And I know when we've talked, it seems like each time we talk, that profile moves further out. I think you've been talking about on the order of 2,300 or so shop visits for CFM56 right now, going to like 2,000 in 2030, something like that profile. Is that still how we should think about it? And if we were to translate that into revenues because there will be pricing increases, how do you think about the profile today?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Yeah. Doug, I think that curve fundamentally is one we would endorse today. We're going to see growth here in 2025. In that regard, we'll see a plateau in that 2,300 range in the next couple of years, and then we think there'll be a slow fade. But we've been predicting that for a while and we've been wrong. So we'll see how that plays out. But I do think the combination of the work scopes, a little bit of price and the like will allow us to buffer those volume pressures and offset that at the revenue and at the margin line. Our critical challenge of course, will be that bringing on the LEAP not only in terms of capacity to service the customer, but to replicate that financial profile over time and over time I think we'll be able to do that.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Well, I want to go back to what you highlighted at the beginning in terms of next generation technology, the RISE program, the open road, a fair amount about it. But I guess the two things that, the two questions I had around that were, one, can you give us a sense of timeline if we're going to an open road because I know airlines have been out there. You've been briefing them on this. So I know it's not fiction. Right.

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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I thought those are confidential briefings.

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Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Well, yeah. But anyway, I think you may have been out there, so what are we thinking about in terms of timeline?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Well, I think that what we have been doing the last few years and what we'll do again at the airshow in particular is just share with our airline customers as we do the airframers, of course, our technology roadmaps. I haven't talked to a single customer that isn't looking for a step function improvement in performance to undergird the introduction of a next generation narrowbody. And we clearly want to be under wing on the platforms that matter. And we think with RISE, the suite of technologies that are under development, particularly with the open rotor, that we can deliver a 20% improvement in fuel efficiency and not trade that off or trade that off with durability or reliability performance. So ultimately that engine will need an aircraft right to go into service. The airlines will, I think, shape the decisions the airframers make with respect to what they introduce when they do it. So, Doug, it's really not for us to say when we're going to see that architecture EIS, but I think what we will say is that we're really encouraged by the feedback that we're getting. We really like the performance that we're seeing in our test environment. We recently talked about a 3,000 cycle endurance test we just completed on a high pressure turbine blade. There are dozens of these sorts of technology milestones that we're completing that will ultimately yield the product that we'll launch. We talked recently about the Airbus flight test program. Later, the roadmap toward that later this decade, really encouraged by how prominent the open rotor design feature to the recent Airbus technology symposium. So there's a lot of time, there's still a lot of work to do with the engine, with the aircraft. But we're excited about what will fly, call it, 2035, 2040.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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I want to switch over to defense for a bit. On the defense side, so you had a book to bill of, I think, 1.2 last year and you're projecting mid-to-high single digit type growth. Can you talk about what the key platforms are that are driving those growth assumptions?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Sure. I mean, I think for us, we certainly are focused on margins because we know we've had recently margins that are a little south of where we want to be in that segment. But from a growth perspective, we really like where we are from a rotorcraft perspective, the Apaches, the Black Hawks and the like. We think they will lead the overall unit volume growth. We'll see a little bit of a slower trajectory with combat. But there are a number of platforms there like the 15EX that we're excited about. And as we think about the future, right, whether it be sixth gen combat, the related CCAs, hypersonics and the like, there are a number of things that we're doing within our Edison Works group to make sure that we're well-positioned with what will come next gen. So you put all that together, it's why we think we end up in that mid-single-digit range.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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And that's true both as you're thinking about. I mean, clearly things like the F-47 would be I would think more of a long term one given the timing of that. But near term, they've got the 15EX, but are there other – what are some of the other important pieces to that in the near term?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Well, I would say that the primary volume growth that you will see will largely come with the T700s on the Black Hawks and the Apaches.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Okay. Yeah, right. I guess, something that we've talked about before, I'm going to ask you again but way back there was an effort GE was looking at moving into other areas, into the Smiths acquisition and things like that. How do you think about GE Aerospace as it stands right now with respect to what you have a very focused propulsion portfolio, is that something that you would want to extend as some of your peers have? What's the future here?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Doug, I'm not sure what I told you last time you asked, but I hope I'm going to give you the same answer, because from a strategy perspective, from a capital allocation perspective, I think management and the board are well aligned. We know we're going to have a significant amount of cash generation over the next several years. We really think that priority one will remain reinvestment in the business. We talked about that $3 billion of R&D figure. We talked about being in that 6% to 8% of revenue range. We really want to make sure, come thick or thin, that we continue to invest in inventing the future of flight. So that really is job one.

We clearly have a strong bias toward returning capital to shareholders. We think that works given the context that we operate in today, let alone who we are. As you've seen between buybacks and dividends, we're going to return in excess of 100% of our annual cash flow. We've got, I think, a framework that has us returning, call it three quarters of what we do back to shareholders over time. But that still will leave us ample opportunity, ample firepower to do smart M&A. I don't think we're keen to build out an all singing all dancing aerospace portfolio just for its own sake. One of the things that served me well over time is making sure that you're strong, not just big. And we know we've got an exceptional franchise today, but there are things that we will do to invest inorganically, both in the existing positions that we enjoy in propulsion and perhaps to do some things that are near adjacencies. But I don't think there's a banker whispering, GE Aerospace is going to do this or do that. It's going to be big and bold and revolutionary.

Douglas S. Harned
Analyst, Bernstein Institutional Services LLC

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Okay. Well, good. Well, to wrap up here, maybe you could give us a sense as you look over the next year, what are your priorities and what are you going to be focusing your time on?

H. Lawrence Culp, Jr.
Chairman & Chief Executive Officer, GE Aerospace

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Well, I think we go back to where we started. Right. There's so much that we need to do to service the backlog. It's incumbent upon me to make sure that we're doing that, all the while making the right bets as we think about inventing the future flight, both commercially and with respect to defense. That's our strategy. That's where CEOs ought to be focused. But if we're going to do that, we're going to do it right. We're going to it sustainably. We're going to do that with FLIGHT DECK. I have very strong points of view in that regard, so I spent a good bit of time in that regard. But ultimately, it's about the team and the greatest leverage I get as a CEO, the most important decisions that I'm party to are those that pertain to the team making sure we're recruiting, developing, retaining, promoting the best possible people. I'm really proud of the team we've got, but we need to continue to strengthen the team, to improve and grow. So I spent a tremendous amount of time on that as well.

Douglas S. Harned

Analyst, Bernstein Institutional Services LLC

Great. Well, I think we'll call it there. But Larry, thank you very much. That was great.

H. Lawrence Culp, Jr.

Chairman & Chief Executive Officer, GE Aerospace

Doug, thank you. Thank you.