



COLLABORATION ON FUSELAGE DEVELOPMENT PROGRAM - LEONARDO AND VERTICAL AEROSPACE

News / Manufacturer



Vertical Aerospace announced that it has agreed a joint development program with Leonardo for the design, testing, manufacture and supply of the carbon composite fuselage for Vertical's VX4 electric aircraft. Vertical and Leonardo will work together on optimising lightweight composite structures, modular design, systems installation, and structural testing for the co-development of the aircraft's fuselage. This is currently in place for at least six certification aircraft, up to the successful certification of the VX4. The agreement has also stated the potential to scale fuselage production to 2,000 aircraft a year to meet Vertical's existing market-leading order book demand. Vertical has what it believes is the largest conditional pre-order book (by value) in the eVTOL industry, of up to 1,350 aircraft worth \$5.4 billion from American Airlines, Avolon, Bristow and Iberojet, including pre-order options from Virgin Atlantic and Marubeni, and through Avolon's placements, airlines JAL and Gol.

Leonardo has long-established expertise in composite aerostructures development and manufacturing on civil and defense programs. The aerospace firm also has a close relationship with Vertical's strategic composite materials supplier, Solvay. Vertical and

Solvay are jointly developing advanced materials and manufacturing technologies that will enable high volume manufacture of the VX4.

Vertical's partnership with Leonardo builds on its unparalleled ecosystem of partners, including Rolls-Royce, Honeywell, Solvay, GKN and Microsoft. Vertical continues to grow its team of experienced engineers and aviation executives and expects to begin the VX4's test flight programme later in 2022.

Vertical's VX4 is paving the way for advanced air mobility and is expected to revolutionise the way we travel. The near silent, entirely electric, piloted aircraft is expected to have a range of over 100 miles and to reach top speeds of up to 200mph. With a four-passenger capacity, the zero operating emissions VX4 will also have a low cost per passenger mile, similar to that of a taxi.

Michael Cervenka, President of Vertical said: "Vertical is pioneering electric aviation and is on a mission to transform the way people travel. I have been hugely impressed by Leonardo's highly innovative and industry leading technical and manufacturing capabilities and our partnership has got off to a flying start. I'm thrilled that Leonardo will be joining us in this journey. We have a market-leading pre-order book for our VX4, and this partnership will ensure that we can scale the programme to meet demand."

Lucio Valerio Cioffi, Leonardo's General Manager, said: "Advanced air mobility is part of Leonardo's mandate to innovate using our cutting edge, human-centred technology and industrialisation expertise. We're proud to collaborate with Vertical as part of our strategic vision in this brand new sector."

Giancarlo Schisano, Managing Director of Leonardo's Aerostructures Division said: "Leonardo, as partner to the world's leading commercial aircraft manufacturers, is specialised in the production and assembly of major structural composite and metallic components for commercial aircraft. Leonardo strives to bring new technologies, materials and processes into our established practices in our production sites. This will be the case at our Grottaglie plant in Southern Italy, where we will focus our VX4 activities; the plant is one of the most advanced facilities in Europe to produce composite aerostructures."

The continuous development and integration of cutting-edge solutions across all domains, such as Advanced Air Mobility, is a key element of Leonardo's BeTomorrow2030 Strategic Plan.



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