

# Cabin interior Elysian Aircraft E9X



This graduation thesis proposes a new cabin interior for the Elysian E9X.

**Elysian E9X** | The Elysian E9X will be a next-generation aircraft designed to carry 90 passengers over a distance of 1,000 kilometers. It represents a sustainable short-haul economy flight solution in the future.

**Design goal** | Design a lightweight 90-passenger cabin interior seat with enhanced legroom, easy luggage access and a spacious layout that gives passengers a sense of control and the ability to move more freely during the flight.

**The concept** | The interior design features a cabin where luggage is stored in containers under the seats to enhance the sense of spaciousness in the cabin. An additional false floor has been installed above the structural floor. This extra layer creates space for luggage containers between the two floors.

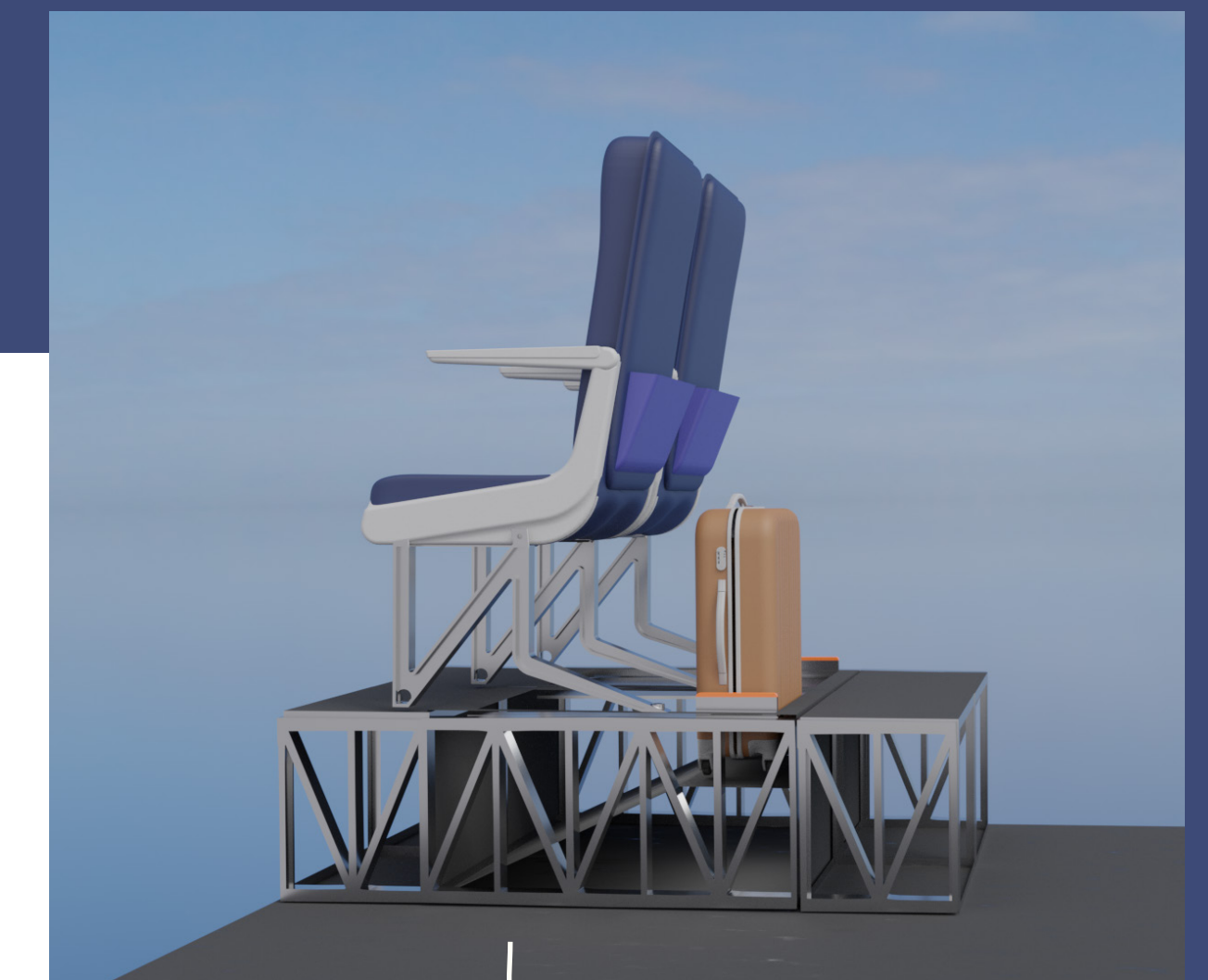
**How does it work?** | You board the aircraft and walk to your seat. Once seated, you slide open the luggage container beneath you and place your luggage in the container. If you need to access your belongings during the flight, you can do easily from your seat.

**Advantages** | For the future passenger: The new design creates a more spacious cabin where passengers can enjoy an unobstructed view. Increased legroom and easy luggage access provide greater convenience and a bigger sense of control during the flight.

For future airlines: Faster boarding reduces turnaround times as passengers store luggage at their seats. More open space improves movement for both passengers and crew. Flexible seat configurations and customisable luggage compartments allow airlines to adapt the layout to their own needs. Thereby, the design eliminates the need for extra construction materials, making it a more sustainable choice.

For the system: This concept integrates seamlessly into existing aircraft fuselages without big structural changes. It maintains the supply chain while offering aircraft manufacturers or airlines the option to lower the floor for an even more open and spacious cabin feel.

**Validation** | This concept is tested using a full-scale 1:1 model with aircraft seats. The design enhances the sense of spaciousness during the flight, which was evaluated using VR technology.



Place the luggage on the container



Slide the luggage into the container



Close shutter box with hand or foot

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02-04-2025  
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