

INTERNSHIP - Positive Aviation - Comparative study of the handling qualities of firefighting scooper aircraft

4 to 6 months internship. Function: Industrial Engineering & Design. Start date: April 2025. Location: Rue Gabriel Clerc, 31700 Blagnac, France. Teleworking not authorized. Required level of study: Master, MSc or Grande Ecole Program.

The FF72 is a firefighter scooper aircraft derived from the ATR 72, designed and manufactured in France, capable of meeting the need to replace the Canadair fleet from 2028 with a modern aircraft and improved performance.

The FF72-X1 project aims at developing the know-how and skills of a seaplane design office in France, through the manufacturing and flight testing of an ATR 72 demonstrator on floats.

The intern will participate in enriching the knowledge base of the Positive Aviation design office on the handling qualities of firefighting scooper aircraft by:

- Compiling the FF72 stability and control handbook. This document will summarize the characteristics of the FF72 around handling qualities (like ground clearances, weight and balance diagrams, lift curves, thrust curves, low and high speed limitations, longitudinal / lateral / directional control and stability).
- Performing a detailed comparative study of the FF72 against comparable firefighter scooper aircraft, most importantly the CL-415.
- Highlighting the associated strengths and areas for improvement on the FF72.
- Proposing a scientific approach based on modeling, simulation and/or tests to build up on these strengths and to work around these areas for improvement when it comes to developing the FF72 concept of operations.

Feeling inspired and wanting to apply, send your CV and motivation letter to career@positive-aviation.com, and we get back to you shortly.