

AVX Aircraft Company

Job Description



Job title: UAS Flight Controls Lead

Work Location: 6310 Southwest Blvd, Benbrook, TX 76109

Division/Department: Engineering

Reports to: Chief Engineer

Attendance Requirements: Monday – Friday (hybrid office / home work schedule)

Full-time

Part-time

Exempt

Nonexempt

Essential Duties and Responsibilities:

AVX has built a powerful brand and we are developing a market leading vertical takeoff and landing (VTOL) unmanned aircraft system (UAS). We are adding to our world-class team to develop this new UAS product.

The UAS Flight Controls Lead will be responsible for developing, implementing, and testing the fly-by-wire Flight Control System (FCS) for the UAS. This will involve working closely with the AVX engineering team, subcontractors and suppliers to execute the flight controls development and test effort.

- Development, design and analysis of UAS flight control systems to include: architecture, interface documents, redundancy requirements, fault detection / fault management and reconfiguration logic, and built-in test requirements; to ensure safe and effective deployment and operation of the UAS.
- Develop new and unique flight control architectures for next generation VTOL UAS.
- Coordinate development of the Control Law Design, documentation, and implementation into the embedded software of the Flight Control Computer.
- Perform failure analysis and hazard assessments associated with the FCS. Recommend and develop mitigation strategies and techniques.
- In coordination with FCS supplier, develop and approve test plans, test procedures, specifications, and interface documentation.
- Participate in FCS integration tests, ground tests, and flight tests.
- Perform related duties as assigned by the UAS Chief Engineer.
- Maintain compliance with company policies and procedures.

Must be eligible to perform work on U.S. military programs.

Education and/or Work Experience Requirements:

- BS degree or equivalent work experience in Electrical Engineering, Aerospace Engineering, or related field (Master's degree preferred).
- Excellent verbal and written communication skills, including ability to effectively communicate with internal and external customers.
- Experience developing and/or testing Fly-By-Wire aircraft flight control systems.
- Experience developing flight control systems for VTOL UAS desired.
- Familiarity with low size, weight, power components appropriate for a Group 2/3 UAS desired.
- Familiarity with aircraft control systems modeling and implementation (MATLAB and Simulink experience desired).
- Familiarity with aircraft actuation systems (background in electromechanical is preferred).
- Ability to work independently with minimal supervision.
- Familiarity with military qualifications standards for airborne electronic systems and software.
- Strong communication skills both in-person, on the phone and in virtual settings.
- Proficiency in standard office applications (MS Word, Excel, PowerPoint).

Physical Requirements:

- Ability to safely and successfully perform the essential job functions consistent with ADA, FMLA, and other federal, state, and local standards, including meeting qualitative and/or quantitative productivity standards.
- Ability to maintain regular attendance consistent with the ADA, FMLA and other federal, state, and local standards
- Strong communication skills both in person, on the phone, and in virtual settings.