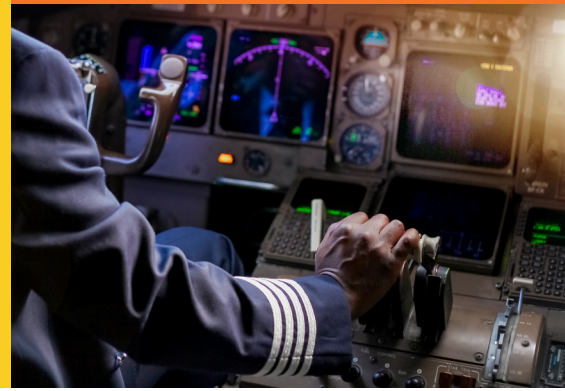


## RTCA Human Factors Training Course



The human factors training course offering by RTCA provides a practical application of human factors engineering for a broad scope of personnel involved in the management, engineering design, maintenance, and operations of aircraft.

The training course, developed in conjunction with Georgia Tech Research Institute, examines the foundational elements of human factors, through an integrated approach in learning. The course demonstrates proactive human factors considerations and planning necessary to address the certification process throughout design and testing.

Based on the RTCA developed standard DO-372, “Addressing Human Factors/Pilot Interface Issues for Avionics”, the course utilizes real world examples of good practices and lessons learned that inform the development and certification process. Through this practical look at human factors applications, participants will learn how to avoid common pitfalls that have been observed in past certification efforts.

### The course contains:

- An overview of how civil flight decks are designed, evaluated, and certified
- How human factors engineering contributes to safe and desirable flight deck design
- An introduction to the tasks and responsibilities of flight deck human factors engineers to non-human factors engineers
- A review of the physical, physiological, and cognitive performance capabilities of flight crews
- An understanding of the limitations of flight crew’s performance, how it is impacted by system variables in the flight deck environment and impact crew workload and human error

### Training Details

**Course Duration:**  
3 days

**Course Fee:**  
\$1,899 for Members  
\$2,299 for Non-Members

**Register and More Details:**  
[www.rtca.org/training/human-factors/](http://www.rtca.org/training/human-factors/)



### This course is valuable for:

- Managers
- Project/program managers
- Technical project managers
- Flight test engineers
- Engineers involved in flight deck design & certification
- Newly hired human factors specialists
- Flight operations test pilots
- Flight crew, dispatchers, cabin crew, air traffic controllers

# RTCA Human Factors Training Course

## Learning Objectives of RTCA Human Factors Training Course

### Course Instructors



**Jason Stroup**  
Georgia Tech  
Research Institute  
Associate Division  
Chief, Systems  
Engineering  
Research Division



**Clayton "CJ" Hutto**  
Georgia Tech  
Research Institute  
Senior Research  
Scientist



**Jeff O'Hara**  
Georgia Tech  
Research Institute  
Principal Research  
Scientist

#### Instructor Bios

<https://www.rtca.org/training/human-factors/>

#### Module 1:

### Overview and Introduction to Human Factors

- Understand the contributions of human factors to flight deck design and certification
- Become familiar with the regulations and guidance documents that human factors professionals use regularly in flight deck design and certification
- Understand the development life cycle phases within the certification process

#### Module 2:

### Human Performance Basics

- Understand the impact of physical and cognitive capabilities and limitations on flight deck design
- Develop a familiarity with regulations and advisories that address physical and cognitive characteristics within flight deck design
- Develop a familiarity with the concept of human error and the regulations related to mitigating human error

#### Module 3:

### Human Factors Foundational Elements of Program and Design

- Understand how product development lifecycle is manifested within the context of human factors in flight deck design and certification
- Develop familiarity with the goals, inputs, activities, and outputs associated with each phase

#### Module 4:

### System Design and Development

- Become familiar with the phases of user-centered design — analysis, design and prototyping, and evaluation
- Understand the relationship and components within each phase and the related regulations and guidance
- Understand the importance of the design history file and the type of information typically included

#### Module 5:

### Certification

- Understand the activities, communications, and documentation needed to show compliance as required for flight deck certification
- Understand key concepts within the certification process, including: level of certification scrutiny, means of compliance, compliance matrix

#### Module 6:

### Submitting Human Factors Certification Artifacts

- Review the steps leading up to and including submission of HF certification artifacts
- Understand what artifacts are included in the final submission of HF certification artifacts