

RANGE FLIGHT SAFETY ANALYSIS COURSE

SATERN Course ID: SMA-AS-WBT-435

Duration: 14.5 hours

The NASA Range Flight Safety Analysis Course has been updated and refreshed. The course has been converted to a fully web-based format incorporating ~840 slides, 27 videos, and 8 instructor-led demonstrations. Course duration is 14.5 hours.

This course gives a detailed overview of range flight safety analysis from a NASA-centric perspective. It includes the NASA, Federal Aviation Administration and Department of Defense requirements for flight safety analysis; a discussion of range operations hazards, risk criteria and risk management processes; and in-depth coverage of vehicle containment and risk analysis methods. Vehicles addressed are Unmanned Aircraft Systems (UAS), Unguided Launch Vehicles (sounding rockets), Guided Launch Vehicles (ELVs and RLVs), and other NASA-unique flight vehicles. The course focuses on debris hazards but includes an overview of toxic, blast, laser, and radiation hazards. Throughout the course, instructor-led demonstrations illustrate key aspects of flight safety analysis.

The new course is based on a fully modular structure. Each Module has its own mini-exam at the end. This structure facilitates the student's ability to progress through the course at their own pace whenever they have time.

Prerequisite:

1. Completion of SMA-AS-WBT-410, Range Flight Safety Orientation, or equivalent level of experience or training, is required

Target Audience:

 This course is intended for program, project and center personnel who conduct hazardous operations or design potentially hazardous systems to operate on a range.

