

An Introduction to Explosives and Explosive Safety

OVERVIEW

This class covers an introduction to explosives and the safety of explosives. We will walk through definitions and fundamental theory of explosives. We will go through historical accidents and ordnance to illustrate particular explosives and safety issues. The safety requirements for storage and handling of explosives will be presented.

LEARNING OBJECTIVES

By the end of this course participants will be able to:

- Understand the fundamental properties of explosives
- Understand the fundamentals of explosive safety
- Apply lessons learned from historic explosions and accidents
- Identify the most common explosives and what they are used for

WHO IS THIS FOR?

Engineers and technicians who are working around explosives, or are starting to work with explosives, or practitioners who want to review basics and go over lessons learned.

INSTRUCTORS

Eric Cardiff is the founder of Virtucon Earth and Space, LLC, and former chief engineer for propulsion at NASA Goddard Space Flight Center. He received his Ph.D. in propellants from Penn State University in 2002, and has over 20 years of experience in design, build, test, and flight of spacecraft propulsion systems. Dr. Cardiff has worked on multiple high-profile mishap investigations and spacecraft anomalies, and has expertise in propellant handling. He has also contributed to the development of both ASCENT and HyperFlex propellants (and explosives) and propulsion systems.

COURSE FEES

\$300 per person for local onsite training

\$450 per person at JANNAF Conference

Current university student rate at JANNAF \$300, for local onsite \$150

HOURS

Classroom Hours: 2 classroom hours