### **Introduction to Creo Simulate 3.0**

#### **Overview**

Course Code

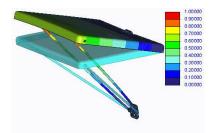
WBT-4504-0

Course Length

40 Hours

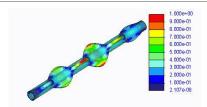
In this course, you will learn how to test, validate, and optimize product designs with the Creo Simulate module. Creo Simulate enables you to simulate structural and thermal loads on product designs. You will complete comprehensive, hands-on lab exercises that simulate realistic analysis and design optimization activities. You will also be introduced to advanced topics such as dynamic analyses, combined mechanical and thermal analyses, and Optimization Studies. After completing the course, you will be able to run engineering analyses and optimizations on your product design models.

At the end of each module, you will complete a set of review questions to reinforce critical topics from that module. At the end of the course, you will complete a course assessment in Pro/FICIENCY intended to evaluate your understanding of the course as a whole.



### **Course Objectives**

- Understand the basic Simulate analysis process
- · Understand theory and simulate model topics
- Explore results
- · Explore materials and material properties
- Understand and use Simulate idealizations
- Understand and use structural loads
- Understand and use structural constraints
- Run structural analyses
- Understand convergence
- · Analyze assemblies with Simulate
- Complete design and sensitivity studies
- · Run optimization studies
- Understand the basics of Thermal analysis



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#### **Prerequisites**

• Three months of Pro/ENGINEER Wildfire 5.0 or Creo Parametric experience

#### **Audience**

• This course is intended for design engineers and mechanical designers. People in related roles will also benefit from taking this course.

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