

Residential Energy Professional (Online)

Training for a Career in Energy Efficiency



Course Description

iCAST's *Residential Energy Professional* course is designed to introduce trainees to the technology and processes associated with residential energy efficiency auditing & installation. To prepare our graduates for entry-level efficiency work, the trainees will receive foundational knowledge and skill set through:

- Video demonstration of hands-on applications from industry experts
- Interactive simulator exercises for precision building analysis
- Practice exercises to provide hands-on experience.

In addition to preparing for *BPI Building Analyst* certification, this training will cover best practices and procedures for the audit process, including an in-depth look at analysis and reporting. Trainees will then explore the building materials, mechanical and electrical systems common to energy efficiency upgrades and their associated installation and retrofit techniques (e.g., insulation, air sealing, and HVAC).

Upon successful completion, trainees receive a one-month subscription to *Home Energy Magazine's* online website and a *Certificate of Achievement* from iCAST.

Textbook

Residential Energy: Cost Savings and Comfort for Existing Buildings, 5th Edition, Krigger, Dorsi, ISBN-13: 978-1880120095

The book will be mailed out to you upon enrollment with expected delivery time taking up to three (3) business days.

Learning Activities

- Performing an energy audit
- Practice test for advanced BPI Certification course
- Industry-specific career planning tools
- Combustion Appliance Zone safety testing simulator
- Video demonstration of the setup and operation of a blower door
- Use of diagnostic equipment, e.g. combustion analyzer, infrared camera, watt meter, etc.
- Analyzing energy bills
- Cost justification and analysis
- Writing an audit report
- Educating the homeowner/client
- Energy conservation tips and techniques
- Contextual math exercises
- Video demonstration of insulation techniques
- Review door and window rating systems
- Identifying heating and cooling efficiencies
- Identifying indoor air quality and building safety issues
- Understanding energy use of appliances, electronics, and lighting in the home

Technical Requirements

- You must have Microsoft Internet Explorer 6+, Google Chrome or Mozilla Firefox.
- You must have the Adobe Flash player installed.
- One week simulator training is PC-compatible only until Fall 2011

