

# EasyPower Essentials Training

» **EasyPower<sup>®</sup> Hands-On**

» **Protective Device Coordination**

» **Arc Flash Risk Assessment**



**LEARN WHAT'S NEW IN IEEE 1584-2018 and NFPA 70E-2021**

Live Web-Based Training  
May 15-19, 2023

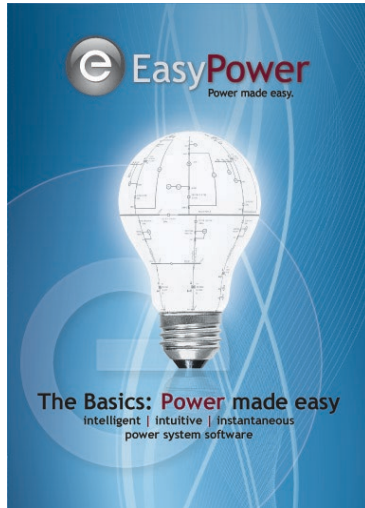
*EasyPower, state-of-the-art  
Power System Analysis Software!*

**Bentley**<sup>®</sup>

EasyPower is Part of Bentley Systems

# Hands-On with Arc Flash & Protective Device Coordination

**Covering the completely revised IEEE 1584-2018 and latest changes in NFPA 70E-2021**



EasyPower's training course is tailored for engineers and designers who want to learn new skills or polish existing skills in the application of the EasyPower software suite for power system studies and design.

The Arc Flash session on Days 4 and 5 will cover the all new arc flash calculation standard IEEE 1584-2018 and provides the essential information needed to understand the impact and how to apply it.

This training class will use the latest version 11.0 of EasyPower and cover important recent changes and updates to the program.

The training reference manual provided includes necessary theory and extensive notes. This training caters to both the novice and experienced power system engineer.

No prior experience with EasyPower is needed.

## **Days 1 & 2 – EasyPower Essentials 1: Hands On Course 1.2 CEUs**

*Monday, May 15 – 9:30 a.m. to 3:00 p.m. CST*

*Tuesday, May 16 – 9:30 a.m. to 3:00 p.m. CST*



### **Topics Include:**

- » EasyPower Overview
- » EasyPower Functions and Features
- » Hands-On Development of EasyPower One-Line and Database
- » Motor Control Centers and Panel Schedules
- » Application of EasyPower Short Circuit and Equipment Duty
- » Overview of EasyPower Power Flow
- » Sample Cases and Applications
- » Scenario Manager

## **Day 3 – EasyPower Essentials 2: Protective Device Coordination Course 0.6 CEUs**

*Wednesday, May 17 – 9:30 a.m. to 3:00 p.m. CST*

### **Topics Include:**

- » Application of EasyPower Protection & Coordination module for Protective Device Coordination Studies
- » How to create time-current curves quickly and easily in EasyPower for both Phase and Ground Overcurrent devices
- » How to easily adjust settings graphically and instantly see impact on arc flash levels
- » Using EasyPower to perform Protective Device Coordination Studies
- » Modifying the EasyPower library
- » Learn how to use the Sequence of Events capability in Protection & Coordination
- » Learn about optional **Smart PDC** feature that will automatically coordinate your system and verify proper equipment protection

# Arc Flash Risk Assessment

Developing and implementing an ongoing arc flash hazard program which meets the new regulations noted in NFPA 70E, IEEE-1584, and the current OSHA Standard 29 can be challenging. Rule of thumb methods could result in both unnecessary worker exposures to hazards from under protection and significant lost plant productivity due to overprotection.

The industry has recognized the benefits of obtaining accurate arc flash hazard data. Consensus standards recommended that arc flash calculations be completed in conjunction with short circuit calculations and protective device coordination. The use of EasyPower Arc Flash can save companies thousands of dollars annually, per worker, in lost productivity.



Performing a study and applying labels is only one aspect of a true arc flash hazard program. A comprehensive corporate electrical safety program also includes development and implementation of the proper processes, procedures, documentation, and training programs. EasyPower can be used in developing a complete safety program.

## Days 4 & 5 – EasyPower Essentials 3: Arc Flash Risk Assessment Course 1.0 CEUs

Thursday, May 18 – 9:30 a.m. to 3:00 p.m. CST

Friday, May 19 – 9:30 a.m. to 3:00 p.m. CST

### Topics Include:

- » Arc flash causes and impacts
- » Latest requirements of NFPA 70E-2021 for arc flash safety
- » **Complete update on the all new IEEE 1584-2018 calculation method** including comparison with previous IEEE 1584-2002 methods
- » Explanation of all relevant arc flash settings and options in EasyPower 11.0 with special emphasis on changes related to the new IEEE 1584-2018
- » Overview of Personal Protective Equipment
- » What should be in an EasyPower model for an arc flash study
- » Short Circuit Analysis for an arc flash study
- » Equipment Duty Evaluation and why this is an essential part of any arc flash study
- » Protective Device Coordination for an arc flash study
- » Application of EasyPower ArcFlash for arc flash hazard determination
- » Numerous hands-on examples covering all aspects of arc flash analysis, so you learn by doing
- » Applying Scenario Manager to quickly and automatically evaluate unlimited number of operating conditions and find the worst-case arc flash at each location
- » Learn EasyPower's built-in capability to handle common arc flash reduction tools such as maintenance mode settings, zone selective interlocking, and differential relaying
- » How to create, print and customize arc flash warning labels
- » Arc flash hazard analysis with various system configurations including bus ties, generators, high impedance grounding, current limiting fuses and breakers, motor contribution, long feeders, etc.
- » The course also includes a comprehensive manual

# General Information

EasyPower conducts training at various times throughout the year. We offer training courses in both a live web-based and in-person format for your convenience. **Please note:** No audio or video recording is allowed during the training sessions.

This web-based class covers the same curriculum as our traditional in-person training classes. Students can access the training on our web-based platform from their own computers. They can hear the instructor and see his screen live. Students can interact and ask questions.

## Computer Requirements

This is a practical, hands-on seminar; you will need to provide your own computer. EasyPower does not provide computers. ***The Wednesday before the seminar (May 10) you will be supplied with and required to install a temporary copy of EasyPower® training software on your laptop via download link; this will require admin rights are enabled on your laptop and you have access to the Internet.*** We require that you use the training software, so you will have access to all the features available within EasyPower.

If you are a current EasyPower user with your own license on your laptop, you may opt to uninstall your company's copy of EasyPower, or simply plan to reinstall upon completion of the seminar. The seminar copy of EasyPower will not override or affect any other types of software on the laptop; however, if you have a personal copy of EasyPower loaded, it may affect some of those files. If any device library changes have been made to your personal copy, you will need to archive your device library before installing the seminar copy of EasyPower. ***You will NOT need your EasyPower license for the training class.***

## Minimum System Requirements

- Operating System: 32-bit and 64-bit versions of Windows® Server 2008, Server 2012, Server 2016, Windows 10 / Windows 11
- CPU: Intel®-based computer with dual-core or higher processor
- RAM: 512 MB (2 GB recommended)
- Monitor: 1280 x 1024 or higher resolution monitor and video adapter
- Hard Disk: 1 GB disk space
- Mouse: Microsoft mouse or other compatible pointing device with spin wheel
- Listening Device: Computer speakers or headset/headphones that can be connected to your computer
- Microphone: A computer microphone or an integrated headphone with microphone. Cell phone-type headphones with integrated microphone will work if they can be plugged into your computer.
- Internet: High speed internet recommended

## EasyPower Training Contact Information

Contact our training department at 503-655-5059 between 8 a.m. and 4 p.m. PST with your training questions, or email [training@easypower.com](mailto:training@easypower.com).



# COURSE INFORMATION

Course Dates & Location: May 15-19, 2023 Live Web-Based Platform | **Registration closes May 8, 2023**

**How to Register:** Submit registration on Customer Portal [here](#)

<i>Course Description</i>	<i>Dates</i>	<i>Price per Student</i>	
		<i>Standard Course Fee</i>	<i>With Premium Maintenance*</i>
EasyPower Essentials Hands-On, Protective Device Coordination, and Arc Flash	May 15-19	\$2,200.00	Training points may be applied up to 50% of course fee

\*EasyPower users with current premium maintenance will receive the appropriate discounted rate on seminar registration fees. You will also qualify for the maintenance discount if you purchase EasyPower within seven days of seminar completion.

**Substitutions and cancellations** are allowed at no additional charge if EasyPower is notified **prior** to the registration closing date. Substitutions **after** the registration closing will incur a \$100 administrative fee to cover the costs of course material and certificate replacements. For any **cancellation received after** the registration closing date, the attendee will incur a \$500 administrative fee. No refund or seminar transfer will be issued without cancellation notice provided to [training@easypower.com](mailto:training@easypower.com).

**NOTE: No audio recording or video recording is allowed during training sessions.**

Interested in training at your facility? Contact us for a customized proposal for client site training at your location!