

# **Solar Power for Electricians**

## On-Line Electrical – 16 hours

COST: \$199.00

Successful completion of this course results in an ABC certificate and is accepted as Continuing Education towards renewal of a California electrical license.

TO REGISTER: Call or email Continuing Education at (858) 513-4700 or continuinged@abcsd.org.

**<u>Payment:</u>** Your tuition will be covered in full if you qualify with Training Funds; otherwise, a credit card will be required for the full tuition.

### **COURSE DESCRIPTION:**

This course establishes the fundamental concepts required for safe, code-compliant installation of photovoltaic systems. Focusing on residential and commercial-scale systems, the course includes array configurations and electrical design characteristics for grid-tied Photovoltaic (PV) systems but also covers equipment essential to understanding all types of PV systems, including systems incorporating back-up energy and energy storage sources. This course addresses PV system installations from the perspective of the 2020 National Electrical Code (NEC), including but not limited to: interconnection requirements and calculations; disconnect requirements; overcurrent protection; and wire sizing and grounding requirements, applicable to all types and sizes of PV installations. This course can be taken as an introductory course or as a gateway for those seeking to advance their knowledge in the solar industry.

#### **Course Lessons Include:**

- Solar Electricity Fundamentals
- Photovoltaic Electrical Connections
- Solar Panel Electrical Ratings
- Types of Photovoltaic Systems

- Solar Energy "The Electrical Code"
- Sizing Photovoltaic Circuits
- Photovoltaic Systems with Backup Power

#### **IMPORTANT TO NOTE:**

- Students must pass the final exam to earn credit for this course.
- All course hours must be completed within 90 days of purchase to receive credit.
- A 2020 NEC book is required for this course (and not provided or included in the tuition).
- Review the System Requirements below BEFORE you enroll in this class, to make sure your computer is compatible.

<u>Journeyman Prerequisites</u>: Though not required, the self-paced course "Faultless," which focuses on properly selecting and installing the correct electrical circuit components and conductors needed for different load and circuit configurations, is recommended as a prerequisite.

#### **MINIMUM SYSTEMS REQUIREMENTS:**

- Supported Operating Systems: Desktop or Laptop Running Windows XP and later or running Mac OS X and later
- Latest version of Adobe Flash Player installed. Download latest version at: https://get.adobe.com/flashplayer/
- DSL connection or higher
- REQUIRED BROWSER SUPPORT: Internet Explorer 9 and later, Google Chrome 17.0 and later or Safari 5.1 and later
- MOBILE DEVICE SUPPORT: Tablets with IOS 7 or later and Android 4.2.2 or later.
- Self-paced courses are not officially supported on smartphones of any kind.

**CANCELLATION POLICY**: No refunds or transfers

**TUITION COVERED & Class not completed:** Full tuition will be deducted from any remaining Training Funds.

**QUESTIONS?** Please call (858) 513-4700 and ask for Continuing Education (x206).