

## PROPOSED ELIGIBILITY REQUIREMENTS FOR THE NABCEP CERTIFIED PV INSTALLATION PROFESSIONAL

*NABCEP is proposing revisions to its flagship Solar PV Installer Certification. The revisions will rename the certification and broaden the scope of who is eligible to attain the certification. The following pages contain a draft of proposed changes to the eligibility requirements. They represent the text that will appear in the Candidate Information Handbook for Certification Exams when the proposed changes are finalized.*

### 3. Certified PV Installation Professional Requirements

#### 3.1 Eligibility Requirements for the PV Installation Professional Certification

To become certified and maintain certification, the applicant must minimally

- Be at least 18 years of age
- Meet prerequisites of related experience and/ or education as outlined in Section 3.2 below
- Complete an application form documenting requirements
- Sign and agree to uphold the NABCEP Code of Ethics
- Pay Application and Examination Fees to NABCEP
- Pass a written examination
- Complete continuing education and installation requirements, and pay a Recertification Fee, within the recertification timeframe

#### 3.2 Qualifications for the PV Installation Professional Certification Examination

There are several ways that an individual may qualify to sit for the certification examination. NABCEP recognizes that professionals in the field of renewable and sustainable energy and energy efficient technologies receive their training and work experiences in a variety of ways. Therefore each requirement to qualify for the exam stipulates specific training and/ or experience. NABCEP Staff will review each application to determine compliance with eligibility criteria. Compliance with the requirements of one of the Qualifying Categories below must be documented.

To qualify to sit for the NABCEP PV Installation Professional Certification Examination, every applicant will need to provide documentation as defined in Sections 3.6 to 3.10 to demonstrate:

- 1) A minimum of 10 hours of OSHA approved Construction Industry safety training by presenting an OSHA 10 card (or state or provincial equivalent) **AND**
- 2) That he/ she meets at least **ONE** of the following minimum entry requirement categories:

##### **CATEGORY A**

- i. Completion of 58 cumulative hours of training as defined in Section 3.5 below; **AND**
- ii. Decision making role in the installation of five (5) PV systems in compliance with the requirements of Section 3.4 below;

## **CATEGORY B**

- i. Licensure as a contractor in good standing in solar or electrical construction -related areas; **AND**
- ii. Completion of 58 cumulative hours of training as defined in Section 3.5 below; **AND**
- iii. Decision making role in the installation of three (3) PV systems in compliance with Section 3.4 below

## **CATEGORY C**

- i. Four (4) years of electrical construction-related experience working for a licensed contractor; **AND**
- ii. Completion of 58 cumulative hours of training as defined in Section 3.5 below; **AND**
- iii. Decision making role in the installation of three (3) PV systems in compliance with Section 3.4 below

## **CATEGORY D**

- i. Three (3) years of experience in a U.S. Department of Labor Registered Electrical Construction Trade Apprenticeship Program; **AND**
- ii. Completion of 58 cumulative hours of training as defined in Section 3.5 below;  
NOTE: Training does not need to be in addition to apprenticeship training coursework if requirements of Section 3.5 are met within the curriculum; **AND**
- iii. Decision making role in the installation of three (3) PV systems in compliance with Section 3.4 below

## **CATEGORY E**

- i. Two (2) or four (4) year degree in a field related to renewable energy, construction technology, electrical technology, or engineering technology; **OR**
- ii. Four (4) year degree in a field related to electrical, mechanical, structural, or civil engineering, or architecture; **AND**
- iii. Completion of 58 cumulative hours of training as defined in Section 3.5 below;  
NOTE: Training does not need to be in addition to degree coursework if requirements of Section 3.5 are met within the curriculum; **AND**
- iv. Decision making role in the installation of three (3) PV systems in compliance with Section 3.4 below

NABCEP CERTIFIED PV INSTALLATION PROFESSIONAL ELIGIBILITY REQUIREMENTS SUMMARY TABLE			
Requirements for all applicants	Be at least 18 years of age and Document a minimum of 10 hours of OSHA approved Construction Industry safety training by presenting a 10 OSHA card (or state or provincial equivalent).		
Category	Who	PV Installation Experience	Education
A	Any PV installation professional that has a documented decision making role in the installation of PV systems – such as Lead Installers, System Designers, Site Managers, Foreman, Project Managers, System Engineers, and Quality Assurance / Commissioning Agents	Decision making role in the installation of five (5) PV Systems	58 Hours (see Section 3.5)
B	An existing licensed contractor in good standing in solar or electrical construction-related areas	Decision making role in the installation of three (3) PV Systems	
C	Someone with four (4) years of electrical construction-related experience working for a licensed contractor (includes licensee or owner/ operator)		
D	Someone with three (3) years of experience in a U.S. Dept. of Labor Registered electrical construction trade Apprenticeship Program		
E	Holder of a two (2) or four (4) year renewable energy, construction technology, electrical technology, or engineering technology; or a four (4) year degree in electrical, mechanical, structural or civil engineering, or architecture		

### 3.3 OSHA 10 Hour Requirement

All applicants must show proof of completion of an OSHA 10 Hour Construction Industry class or its equivalent. To find an OSHA class visit: [www.osha.gov/dte/outreach/courses.html](http://www.osha.gov/dte/outreach/courses.html).

NOTE: NABCEP strongly recommends the completion of an OSHA 30 Hour Construction Industry course. OSHA states that “the 10-hour class is intended for entry level workers” and “the 30-hour class is more appropriate for supervisors or workers with some safety responsibility.” Additional note: 18 of the 20 additional hours of training in the 30 hour class may be applied to the 58 hour training qualification requirements in all Categories as described in Section 3.5.1.d

## 3.4 Solar PV Installation and System Requirements

**All systems submitted with the application must meet the following minimum criteria:**

- A. The applicant shall have performed in a decision making role, which had material impact on the quality and serviceability of the installation. Examples of such roles include, but are not limited to: Lead Installers, System Designers, Site Managers, Foreman, Project Managers, System Engineers, and Quality Assurance / Commissioning Agents.
- B. Installation must have been completed within the two calendar years prior to the application submission date.
- C. System must have a minimum rating of 1 kW DC (STC).

## 3.5 Solar PV Training Requirements

**Training must meet the following criteria to be accepted in an application:**

- A. The training was completed in the three calendar years prior to the start of the application.
- B. All training must have a formal training format, with a teacher-learner structure. This implies a connection between a learner and a learning source. This can include web-based training in which the student is separated from faculty and other students but where the learner receives feedback and the student's progress is monitored. All hour requirements are based on "contact hours" between the teacher and the learner.
- C. A minimum of forty (40) of the fifty eight (58) prescribed hours must cover advanced solar PV installation and design principles and practices addressed in the NABCEP PV Installation Professional Job Task Analysis. All advanced PV training must be offered by one of the following education providers:
  - I. Institutions accredited by an agency recognized by the federal Department of Education, or Canadian equivalent (Universities, Community Colleges, etc.)
  - II. U.S. Department of Labor Registered Apprenticeship Training Programs ([www.doleta.gov/oa/](http://www.doleta.gov/oa/))
  - III. Training Programs accredited, Independent Instructors, or Independent Master Trainers certified by the Interstate Renewable Energy Council (IREC) to IREC or IREC ISPQ Standards ([www.irecusa.org](http://www.irecusa.org))
  - IV. Training institutions approved by State Contractor Licensing Boards or Canadian Provincial equivalents
  - V. State or Provincial Department of Education or equivalent registered Vocational / Technical training programs

NOTE: Courses offered by private training organizations or businesses that are not accredited or taught by instructors certified by a recognized third-party will not be accepted for the minimum of 40 hours of advanced solar PV installation and design training.

- D. A maximum of eighteen (18) of the fifty eight (58) prescribed hours may be obtained from non-accredited, non-certified sources such as:
- I. Courses covering building and electrical codes relevant to the installation of solar PV systems
  - II. Entry Level coursework through a NABCEP Registered PV Entry Level Exam Provider, provided that a passing score achievement was obtained on the NABCEP PV Entry Level Exam. NOTE: Courses leading to the NABCEP Entry Level Exam do not qualify for the minimum 40 hours of advanced PV installation and design.
  - III. Additional OSHA or equivalent workplace safety courses above and beyond the required OSHA 10 hour course
  - IV. Training programs and courses that are registered with NABCEP for Continuing Education Credits for the PV Installation Professional Certification
  - V. Any other coursework that addresses topics included in the NABCEP PV Installation Professional Job Task Analysis (NOTE: the applicant will need to submit a course outline and signed letter from the training provider detailing how many hours were spent covering the NABCEP Solar PV Installer Job Task Analysis in the course.)

### 3.6 Documenting Training

When documenting training, the applicant will be required to submit a certificate of completion or a transcript for each completed training program or course used to meet the minimum training requirements. All certificates of completion and transcripts must clearly state that the course covered subject matter directly related to advanced PV installation or the National Electric Code. If the subject matter of the course is not clearly stated in the title, then the applicant must provide a course outline and a signed letter from the training provider or instructor that details how many hours were spent covering the NABCEP Solar PV Installation Professional Job Task Analysis or relevant codes.

### 3.7 Documentation Requirements for Solar PV System Installations

For each PV system submitted, an applicant must submit documentation that summarizes system information, documents system completion, and verifies his/ her decision making role. NABCEP reserves the right to contact system owners/ operators, permitting authorities, and permitted contractors to verify the applicant's work experience and decision making authority.

**3.7.1** To document experience as a PV installation professional, an applicant is asked in the application to provide a concise description of the system and the work performed, including:

- System location
- Date performed
- System info (PV array size, number of inverters and total cumulative inverter capacity)
- Name and phone number of installation contractor
- Name and phone number of contractor listed on the permit or inspection
- Description of work performed by the applicant

**3.7.2** To document the system completion date and that the system was installed according to applicable codes, an applicant must submit a copy of Electrical and/ or Building Permit(s) **and** Final Inspection Report(s) issued by the Local Authority Having Jurisdiction (AHJ) for each system submitted. In regions where permits and inspection reports are not issued, the applicant may submit an inspection report that was written by an independent qualified electrician recognized by the AHJ or an independent certified electrical inspector.

**3.7.3** If the applicant was named on the permit/ inspection document(s) then no additional documentation is needed to verify that he/ she held a decision making role that had material impact on the quality and serviceability of the installation. To document that the applicant who is not named on the permit/ inspection document(s) did hold a decision making role during the design, project management, installation, and/ or commissioning/ quality assurance process, the applicant must submit one of the following:

- A. A signed letter on letterhead from the person, or a member of senior management from the company, that is named on the permit/ inspection document(s). The letter must clearly explain the role(s) and the decision making authority that the applicant held for the system design, project management, installation, and/ or commissioning/ quality assurance process for the system installation; **OR**
- B. Design plans and/ or line drawings that identify the applicant as being responsible for the design; **OR**
- C. A commissioning or quality assurance report that identifies the applicant as being responsible for the system commissioning or quality assurance process

### **3.8 Documenting Licensure**

If the applicant's qualifying category requires that they hold a specific license (Category B), or if a license for solar installation is required in the jurisdiction in which the work was performed, the applicant must submit a copy of his/ her licenses with the application.

### **3.9 Documenting Employment**

An applicant applying under qualifying Categories C or D, must submit documentation for the required experience, starting with the current employment. The applicant will need to submit a job description, a summary of the number and type of solar PV systems he/ she helped install (if applicable), and provide contact information for his/ her supervisor.

A signed letter from the current or most recent supervisor is required to verify the applicant's employment. If the applicant is self-employed, they must provide a detailed description of the work that they do as it relates to PV installation. The self-employed applicant's installation documentation will provide additional "proof of employment".

### **3.10 Documenting Education**

Applicants applying under qualifying Category E must submit copies of official transcripts or diplomas attesting to the completion of the degree(s) or certificate(s) earned.