

## SECTION .0500 - PROFESSIONAL ENGINEER

### 21 NCAC 56 .0501 REQUIREMENTS FOR LICENSING

(a) Education. The education of an applicant shall be considered in determining eligibility for licensing as a Professional Engineer. The terms used by the Board for the specific educational requirements to be eligible to be licensed as a Professional Engineer are defined as follows:

- (1) "Engineering curriculum of four or more years approved by the Board" is defined as a program that has been accredited by the Engineering Accreditation Commission (EAC) of the Accreditation Board for Engineering and Technology (ABET). This program is incorporated by reference including subsequent amendments and editions. This material is available at [www.abet.org/accreditation-criteria-policies-documents/](http://www.abet.org/accreditation-criteria-policies-documents/) or for inspection at the office of the North Carolina Board of Examiners for Engineers and Surveyors. Copies may be obtained at the Board office at a cost of five dollars (\$5.00) per copy.
- (2) "Engineering or related science curriculum of four or more years other than ones approved by the Board" is defined as a curriculum, although not accredited by ABET, of technical courses which contains engineering or scientific principles.
- (3) "Equivalent education satisfactory to the board" is defined as:
  - (A) A graduate degree in Engineering from an institution in which the same discipline undergraduate engineering program has been accredited by ABET (EAC) shall be considered equivalent to an engineering curriculum of four or more years approved by the Board.
  - (B) A bachelor's degree in Engineering Technology, whether or not accredited by the Technology Accreditation Commission (TAC) of ABET, shall be considered equivalent to an engineering or related science curriculum of four or more years other than one approved by the Board.
  - (C) Until June 30, 2016, an associate degree in an engineering related curriculum with an additional two years of progressive engineering experience shall be considered equivalent to an engineering or related science curriculum of four or more years other than one approved by the Board and may be used until that date as a basis for admission to the principles and practice of engineering examination. Once admitted to the examination, an applicant may continue to re-take the examination until required to submit a new application as set out in Rule .0503 of this Section. After June 30, 2016 an associate degree shall no longer be used as a basis for admission to that examination, unless the individual has passed the fundamentals of engineering examination prior to June 30, 2016, in which case the individual may continue the process to take the principles and practices exam based upon the associate degree and it will not be necessary to qualify for admission to the principles and practice of engineering examination prior to June 30, 2016.
  - (D) Foreign degrees are considered equivalent only after receipt of an evaluation report that the degree is substantially equivalent to an EAC/ABET accredited engineering curriculum from the Center for Professional Engineering Education Services, an affiliate of the National Council of Examiners for Engineering and Surveying (NCEES), or from the American Association of Collegiate Registrars and Admissions Officers (AACRAO). The Board shall equate the degree to an EAC/ABET accredited engineering curriculum of four or more years approved by the Board in Subparagraph (a)(1) of this Rule if it receives a substantially equivalent evaluation.

(b) Experience. The experience of an applicant shall be considered in determining whether an applicant is eligible to be licensed as a Professional Engineer.

- (1) Required Experience. In evaluating the work experience required, the Board shall consider the total experience record and the progressive nature of the record. Not less than half of required engineering experience shall be of a professional grade and character, and shall be performed under the responsible charge of a licensed Professional Engineer, or if not, a written explanation shall be submitted showing why the experience should be considered acceptable and the Board shall approve if satisfied of the grade and character of the progressive experience. Experience gained under the technical supervision of an unlicensed individual shall be considered if the appropriate credentials of the unlicensed supervisor are submitted to the Board. Experience

gained in the armed services, usually while serving in an engineering or engineering related group, shall be considered if of a character equivalent to that which would have been gained in the civilian sector doing similar work.

- (2) Definition. The terms "progressive nature of the record," "progressive engineering experience" or "progressive experience on engineering projects" mean that during the period of time that an applicant has made a practical utilization of acquired knowledge, continuous improvement, growth and development have been shown in the utilization of that knowledge as revealed in the complexity and technical detail of the work product or work record. The applicant shall show continuous assumption of greater individual responsibility for the work product over that period of time. The progressive experience on engineering projects shall be of a grade and a character that indicates to the Board that the applicant is competent to practice engineering.
- (3) Specific Credit for Experience. In evaluating progressive engineering experience, the Board shall give credit for experience in the following areas of work:
  - (A) Graduate schooling or research in an engineering program resulting in award of a master's degree from an institution that offers EAC/ABET-accredited programs – one year;
  - (B) Graduate schooling or research in an engineering program resulting in award of an earned doctoral degree in engineering from an institution that offers EAC/ABET-accredited programs – two years, with or without a master's degree, but includes the one year for the master's degree, if obtained;
  - (C) Progressive land surveying - maximum two years; and
  - (D) Teaching of engineering subjects at the university level in an engineering program offering a four year or more degree approved by the Board.

The Board shall not accept combinations of the categories in this Subparagraph as fulfilling all the necessary statutory experience requirements. Every applicant for licensure as a Professional Engineer, as part of the total experience requirement, shall show a minimum of one year experience of a progressive engineering nature in industry, government, or under a licensed Professional Engineer offering service to the public.

Full-time engineering faculty members who teach in an engineering program offering a four year or more degree approved by the Board, may request and shall be granted waiver of the minimum one year experience in industry, government, or private practice if they demonstrate consulting or research work of at least one year's duration, which was pursued to fruition, and which is of a progressive engineering nature. The faculty applicant shall document the work and demonstrate that the work meets the Board's requirement.

- (5) Other experience is considered if it is:
  - (A) Experience obtained prior to graduation as part of an ABET accredited engineering program shown on the transcript, with a maximum credit of one year; or
  - (B) Experience obtained in a foreign country that is performed under direct supervision of a Professional Engineer licensed with a member Board of the National Council of Examiners for Engineering and Surveying (NCEES).

*History Note: Authority G.S. 89C-10; 89C-13;  
Eff. February 1, 1976;  
Readopted Eff. September 29, 1977;  
Amended Eff. August 1, 2014; August 1, 2011; May 1, 2009; August 1, 2002; August 1, 2000;  
August 1, 1998; November 2, 1992; April 1, 1989; January 1, 1982.*