
Fundamentals of Engineering (FE) Electrical and Computer CBT Exam Preparation Course

Duration: 40+ Hours

Lead Instructor: Professor Bobby Rauf, PE, CEM, MBA

Course Description

This forty-hour, live, in-person, FE Review Course is designed to prepare examinees for the FE Electrical and Computer, 6-hour, 110 multiple-choice question, CBT, computer-based test. The course spans over all eighteen (18) subject areas that are covered in the test. These eighteen subjects are covered in the course through seventeen (17) modules. On average, three modules are covered during each eight-hour class day.

Exam preparation and exam taking strategies are covered in the first class to maximize the exam preparation efficiency and the probability of success in the exam. What distinguishes the Sem-Train FE EE course from others are the handouts/notes and the experience of the instructor. See the testimonials. Each participant will be able to contact the instructor – with questions related to the material covered in the class – for a period of sixty (60) days after commencement of the course.

Even though a short introduction to engineering principles and concepts is provided on most topics covered in this course, *this course focuses heavily on problems and the type of questions likely to be encountered in the exam.* All lectures are based on Microsoft® PPT slides and the NCEES® FE Reference Handbook. As problem solving techniques are reviewed in the class and practiced by candidates, continuous reference to the information, data and formulas in the NCEES® FE Reference Handbook is essential for enhancing examinees handbook navigation skills, since NCEES® FE Reference Handbook will be the only reference available to the examinees – in electronic format – during the exam.

Course Material

The course material components required or recommended for comprehensive preparation with this course consists of a combination of handouts provided by Sem-Train and books that are to be acquired by the registrant:

- Instructor's course handouts - about 700 slides - consisting mostly of problems with relevance and pertinence to the exam, covering 18 topics, in 17 segments; provided in electronic PDF format, via Dropbox. **Required. Provided free of charge to every registrant.**

- CBT Exam Demo. View at <http://pearsonvue.com/demo/> - Sponsored by NCEES, **Free of Charge**.
- Softcopy (PDF format) of the FE Reference Handbook, 9.4 edition. **Required. Free of Charge**. Obtain through: <https://account.ncees.org/login>
- Casio **fx-115ES Plus** Calculator. **Required**. Available through various sources, including Amazon.com, for less than \$25.
- Hardcopy of the FE Reference Handbook, 9.4 edition. **Recommended, unless registrant prints the softcopy to follow along in the class**. Obtain through <https://account.ncees.org/exam-prep/> . Est. Cost: \$13.95
- FE Electrical and Computer Practice Exam. **Required**. Obtain through <https://account.ncees.org/exam-prep/> . Est. Cost: \$29.95.
- PPI FE Electrical and Computer Practice Problems, with Access to the e-Textbook. Listed for less than \$100. **Essential for comprehensive exam preparation. Registrants to be provided a 15% discount coupon code** after registering for the course. Obtain this book through: <https://ppi2pass.com/fe-electrical-and-computer-practice-problems-with-access-to-the-etextbook.html>
- PPI FE Electrical and Computer Review Manual, with Access to the e-Textbook. Listed for less than \$150. **Recommended for candidates who are “rusty,” graduated a long time ago, and do not have access to their college text-books. Registrants to be provided a 15% discount coupon code** after registering for the course. Obtain this book through: <https://ppi2pass.com/fe-electrical-and-computer-review-manual-feeerm-package.html>

Schedule:

- Five (8-hour) class sessions - on Saturdays.
- Time devoted to each topic is stated in the syllabus – available at the website as a separate document.

Syllabus:

- Click on the “Syllabus” icon under the FE EE tab.
- Time allocation to each topic during classes is premised on the number of questions listed on the NCEES exam specifications.

Location:

- The class will be held at a location in Northern Virginia, close to a metro station, with free parking, close to local shopping area.

-
- Suitable for participants living in MD, VA, PA, DE and DC areas.

Who should attend:

- **FE EE** exam candidates who have not attempted the exam before and are interested in improving their chances of passing in the first try.
- **FE EE** exam candidates who graduated over five years ago and are interested in improving their chances of passing in the first try.
- Those **FE EE** exam candidates who have not succeeded in their previous attempt/attempts to pass the exam.

Instructor Bio:

Professor S. Bobby Rauf, P.E, C.E.M, MBA; Member, ASEE, American Society of Engineering Education.

Professor Bobby Rauf is the Chief Consultant and a Senior Instructor at Sem-Train, LLC. Professor Rauf has been teaching FE/EIT and PE courses for over 15 years. Over the years Professor Rauf has helped hundreds of examinees pass the FE and PE exams. See testimonials below. In addition, Professor Rauf has over 25 years of experience in teaching undergraduate and post graduate Engineering, Science, Math, Business Administration and MBA courses, seminars and workshops. Prof. Rauf is a registered (PE) **Professional Engineer**, in the State of North Carolina, a **Certified Energy Manager** and a **Certified Ergonomist**.

Prof. Rauf was inducted as “**Legend in Energy**” by AEE, in 2014. He is a published author of multiple engineering and energy books, and professional development courses. He holds a patent in process controls technology.

Prof. Rauf develops and instructs PDH (Professional Development Hour) and, continuing education, engineering skill building courses. He conducts these course in form of webinars, live on-site presentations, workshops, pre-recorded audio and self-study texts. Some his major clients include **Texas A&M University, Saudi Aramco – KSA, University of North Carolina at Charlotte, McNeese University, Lamar University, Clemson University, Association of Energy Engineers, EPIC College - Canada; US Bureau of Reclamation, BHP Billiton, PDHengineer, CED, Y-F Asia, and PDH Source**. Professor Rauf has served as **Adjunct Professor at Gardner-Webb University** since 1989, where he has instructed classes in both the B.A. and M.B.A. programs.

Professor Rauf’s publications include (Available through AEE, Amazon.com, and Barnes and Noble, Targets, etc.):

- 1) Text book titled “**Thermodynamics Made Simple for Energy Engineers,**” Published in 2012 through Fairmont Press and CRC Press – Worldwide distribution.
- 2) Text book titled “**Finance and Accounting for Energy Engineers,**” Published in 2011 through Fairmont Press and CRC Press – Worldwide distribution.
- 3) Text book titled “**Electrical Engineering for Non-Electrical Engineering,**” The Second Edition of this book was published in 2016 through Fairmont Press and CRC Press – Worldwide distribution.

Testimonials from former students and FE/PE candidates:

- 1) Duke Energy Summer 2017 FE Class:
 - a. Bobby was very helpful both with course content and test taking tips!
 - b. The thoroughness of the instructor and notes are great.
- 2) FE Class 2018:
 - a. The instructor is perfect...He is very knowledgeable...He covered all the techniques required (for the exam).
 - b. The materials were very useful and the instructor was very knowledgeable....
- 3) Sang - PE EE Class of 2017 Bobby, I just received the result. I passed...Just wanted to share the good news with you. Thank you so much for your help. Your review course was really helpful and helped me passed the exam.
- 4) Bob E., PE 2017: Thank you for all your work and efforts in providing us review with the (PE) course. I truly appreciate all your input!! I'll remember you for the rest of my life and I'm sure I'll reference your book often!
- 5) Kedwin D., PE: I wanted to say Thank You for your patience and time that you invested into the course. You're a great teacher!
- 6) Cory M. PE 2017: Thank you Bobby for putting on such a great class! I am happy to say that I have passed the PE Power exam. This was my first attempt and can honestly say that this (PE) course helped me achieve a passing score.
- 7) H. Patel, PE 2016: I am glad to inform you that I received my PE exam results this morning and I passed... I would like to thank you very much for your

guidance during the (PE) course I think you directed us in right way that was not only.... exam oriented but will also help me in my professional career.

“SemTrain, LLC, is an approved sponsor and course provider with NY, NYSED, Maryland, NCBELS, North Carolina Board of Examiners for Engineers, New Jersey, and FBPE, Florida Board of Professional Engineers, for the provision of CPC, Continuing Professional Competency, courses.”

“SemTrain, LLC, is approved for US Federal Government Contract Work, and is SAM and CAGE registered.

Important Notes for Registrants:

- In order to enhance the learning experience, the class size is limited – register early.
- Courses are subject to cancellation if the minimum registration threshold is not met. Registration fees will be refunded in entirety if a seminar is cancelled.
- The handouts for the course will be provided via “Drop Box.”
- Course Hours – Each scheduled Saturday: 9:00 am - 5:00 pm ET. Half hour for lunch.

List of Past and Current Clients:

Mr. Rauf of Sem-Train has provided training and/or consulting services to over 5000 engineers and non-engineers through some of the following organizations, over the last fifteen years:

1. **BHP Billiton**
2. **Saudi Aramco (Dammam, Kingdom of Saudi Arabia)**
3. **US Bureau of Reclamation (Hoover Dam)**
4. **US Dept. of State (SemTrain, LLC, is SAM/CAGE approved for Federal Contracts).**
5. **CED**
6. **Balfour Beatty**
7. **Shaw Group**
8. **McNeese University**
9. **North Carolina State University**
10. **University of North Carolina, Charlotte**
11. **Texas A&M University,**
12. **Clemson University,**
13. **PPG Industries, Inc.,**
14. **NEG, Nippon Electric Glass**
15. **PDHengineer,**
16. **PPI, Professional Publications**
17. **University of Maryland Baltimore County,**
18. **EPIC (Canada)**
19. **Y-F Asia – Singapore**

20. Duke Energy

Lead Instructor's Phone: (704) 477-9166. *Note: Interested, potential, attendees are encouraged to call the instructor, directly, with course related questions.*

Cancellation Policy: Full refund granted if registration is cancelled **40 days** or more prior to the scheduled date of the seminar; otherwise, registrant can apply the course credit toward participation in another, scheduled, equivalent event, at a later date. Sem-Train, LLC, reserves the right to cancel the course when minimum registration threshold is not met. In such case, ***Sem-Train, LLC, will issue full refund to the registrant.*** Registrants, in some cases, may be given the option to attend an equivalent course at a later date.

Sem-Train LLC ©

All Rights Reserved.

Prices subject to change without notice.

=====