



300 W. Sinclair, Gillette, WY 82718

Syllabus – Spring 2018

**ELAP 1560, Electrical Apprenticeship VI (3credit hours)**

**Class Meets:** Online delivery (optional Blackboard Collaborate session Monday 6 PM)

<b>Instructor:</b> Ray DeStefano 686-0254 ext. 1310 670-1117 (cell) <a href="mailto:rdestefano@sheridan.edu">rdestefano@sheridan.edu</a>	<b>Office Hours:</b> M-Th 3-4PM, Friday 9-10AM
<b>Prerequisites:</b> None	<b>Co-Requisites:</b> None

**Purpose:**

ELAP 1560 Electrical Apprenticeship VI is the sixth in a series of eight classes which meet the required classroom training for Apprentice Electricians registered with the Wyoming State Fire Marshal’s Office.

**Description:**

This course provides the electrical apprentice foundational knowledge needed for a career as a Journeyman electrician. Topics include transformers, commercial electric services, motor installation calculations, motor controls and voice, data and video installations. The application of the National Electric Code (NEC) is incorporated throughout the course.

**Online Course Delivery:**

This is an online course delivered through “Black Board”. See the “Start Here” section in Black Board for more details on how the course is delivered.

The general arrangement of the course is as follows:

- The course is divided into five modules based on the chapters of the book.
- Content activities for each module include the following:
  - a) Reading assignment
  - b) Supplemental NCCER “connect” online activities and animations
  - c) Supplemental videos
  - d) Supplemental Amatro SCORM activities
- Review and reinforcement activities for each module include the following:
  - e) Completion of book module review questions
  - f) Completion of NCCER “Connect” review questions
  - g) Discussion board for “Wrap Up” and “Think About It” activities from the module power point presentations.
- Assessments for each module include:
  - a) Module Exam (for each module)

### Student Support Resources:

1. Online peer to peer discussion board for students to post questions. The instructor will also answer student questions in this forum.
2. Blackboard collaborate session one night each week (optional). Collaborate will be used as a weekly open forum where students can talk with the instructor and one another regarding the course content.

### Required Text and Materials:

1. Electrical Level Three Trainee Guide, (2014 Revision) National Center for Construction Education and Research (NCCER)
2. NCCER “Connect” Access
3. NFPA 70, 2014 National Electric Code (or Handbook)
4. Calculator with Trig functions. (TI-30 is recommended)
5. Internet \ Personal computer for access to Black Board

### Course Outline, Schedule, Grading (Rubric):

The final course grade will be calculated according to the attached class outline. The class outline shows all of the assessment activities, their due date and their individual value. Your final course letter grade **may be reduced one letter grade** for each incomplete assignment (two letter grades is the maximum reduction). Letter grades will be assigned as follows:

90-100%	A	70-79%	C	Below 60%	F
80-89 %	B	60-69%	D		

### Late work, Make-up work, Attendance:

This is an online course and as such “attendance” means completing assigned work on time (weekly). You are expected to “attend” the class on at least a weekly basis and to keep on schedule with the assigned work.

No make-up or late work will be accepted unless **prior arrangements** have been made in connection with an excused absence. Absences will be excused for college activities, medical reasons, personal or family tragedy, jury duty, and other genuine emergencies. *Please contact me in advance or as soon as practical to excuse absences.* Examples of **unexcused** absences include computer trouble, internet problems, car troubles, weather issues, personal travel, working out of town, overtime work, etc.

Regular attendance is expected of all students attending NWCCD so they may fully benefit from the educational experience. Students receiving financial aid must regularly attend class and actively participate in their coursework in order to earn their aid. Students failing to do so may be held liable for returning financial aid funds. Visit the Office of Financial Aid Services for more information.

### Drop Policy:

I reserve the right to drop a student from the course for any of the following reasons:

1. Two or more unexcused absences (not completing weekly assignments on time)
2. Substantial academic honesty violations
3. Falling behind so that the student is no longer able to participate in a meaningful way in class
4. When a passing grade is no longer reasonably feasible

I will work with students who have legitimate life circumstances *and* who communicate regularly with me. I will make a reasonable effort to contact students via email and phone prior to dropping them.

### Expectations:

Below is a summary of what is required to be highly successful in this course. You can expect to spend 5-6 hours per week in order to fulfill these expectations.

- Complete reading assignments for each module (and re-read, review materials as needed)

- View (and re-view) videos, animations, SCORM (Amatrol) content and take quality notes
- Complete quizzes, assignments, practice problems and the test for each module
- Complete the discussion board assignment for each module
- Communicate with me as soon as practical if you will be absent or if you are otherwise unable to fulfill these expectations

Remember: **All** assignments must be completed regardless of their point value. Your grade may be reduced one letter grade for each missing assignment.

### **Communications:**

In order of preference you may use the following means to communicate with me:

For course content, scheduling, etc. (questions that are public in nature, and may benefit the entire class)

1. Black Board Discussion forum (posts)
2. Collaborate (weekly internet based conference session)

Personal issues or comments including excusing absences or dealing with special circumstances:

1. Phone: 307-670-1117 (cell), 307-686-0254 x1310 (office)
2. Email: [rdestefano@sheridan.edu](mailto:rdestefano@sheridan.edu)

Please only use texting as a last resort. I will make a reasonable effort to return calls and emails within one school day, and to check discussion board posts three times each week spread out between Monday morning and Friday afternoon.

### **Academic Honesty:**

Students are expected to maintain the highest standards of academic honesty and integrity. Academic honesty means performing all academic work without lying, cheating, deceit, plagiarism, misrepresentation, or unfairly gaining advantage over any other student. Violations of academic honesty are in violation of District standards for student conduct and shall result in disciplinary action, which may include:

- being required to complete extra assignments
- receiving a grade of 0 for one or more assignments
- failing the class
- being dropped from the class
- other as determined administratively

### **Disability Statement:**

Students with disabilities who believe they may need accommodations in this class must contact the disabilities services coordinator on their campus as soon as possible to request such accommodations.

### **Program Outcomes:**

1. Utilize the National Electrical Code for electrical design and installation.
2. Design motor control circuits.

### **Course Outcomes:**

Upon completion of ELAP 1560 Electrical Apprenticeship VI, the student will:

1. describe requirements for installation of electrical equipment for general use
2. describe the operation of transformers
3. describe the operation of AC induction motors
4. design basic motor control circuits
5. demonstrate the application of the NEC for transformers, motors, commercial services and for data, voice and video equipment