

Middle Bucks Institute of Technology

Course - Electrical Technology

Instructor: Randy McDowell

Date(s): Week 6 - 11

Lesson Title: Services Level 200

Lesson Number: 1200

Unit: Level 2 - Semester 1 - Electrical Services

Objectives/Description:

Students will participate in a lecture, discussion and demonstration on electrical services and be able to install a 100 amp service to meet NEC standards and pass a written test at a 70%

Tasks/Learning Activities: (student focused)

1262- Make a live service connection.

PA1303 - Use the NEC as a reference to questions and competencies that students perform for all electrical installations.

PA1200 - Electrical Service

PA1201 - Install an overhead service.

PA1202 - Identify parts of an underground service.

PA1210 - Terminate a service panel/load center/sub-panel.

Standards / Assessment Anchors

LITERACY

CC.1.2.11-12.F Evaluate how words and phrases shape meaning and tone in texts.

CC.1.2.11-12.G Integrate and evaluate multiple sources of information presented in different media or formats (e.g. visually, quantitatively) as well as in words in order to address a question or solve a problem.

MATH

CC.2.1.HS.F.2 Apply properties of rational and irrational numbers to solve real world or mathematical problems.

CAREER EDUCATION & WORK

13.1.11.B Analyze career options based on personal interests, abilities, aptitudes,

achievements and goals.

Instructional Activities: (teacher focused)

- *Pre-Learning
- Vocabulary by accident
- Cornell Notes (A X)
- Question aloud
- Questioning while reading
- Using Student-Generated graphic organizers (M A X)
- Triangle Truths (A X)
- Test question list
- Writing journals

Special Adaptations:

Per student accommodations

- Study Guide
- Use of Calculator
- Drill and Practice (Repetition of Material)
- Teacher Modeling
- Communication Regarding Behavior & Consequences (PBS)

Assessment:

- FORMATIVE/SUMMATIVE EVALUATION
- Traditional Tests - multiple choice, matching, true/false, short answer completion
- Traditional Quizzes - multiple choice, matching, true/false, short answer completion
- Module Exam
- Graded Homework
- Student self-assessment
- Determine and evaluate if students adhere to all safety procedures
- Evaluate the student's ability to work within a team when teamwork is necessary
- Account if students are prepared for class each day
- Account if students are wearing appropriate clothing when necessary
- Study guides provided prior to tests

Safety:

All work shall be performed in a workmanlike and safe manner according to industry and OSHA standards.

Lesson Preparation:

Update powerpoint and handouts to meet current NEC standards.
 Insure materials for each student are ordered and/or in good working order.

print our Cornell sheets and copies of powerpoint for each student.
Have a level 300 student build a proper service to use for demonstration purposes.

Resources/Equipment:

Electrical Wiring Residential, Cengage, Most recent edition
National Electrical Code, Most recent edition
Electrical supplies & equipment
Powerpoints
Teacher made handouts
Google Classroom

Additional Notes:

Supplemental materials will be posted on the Google Classroom.