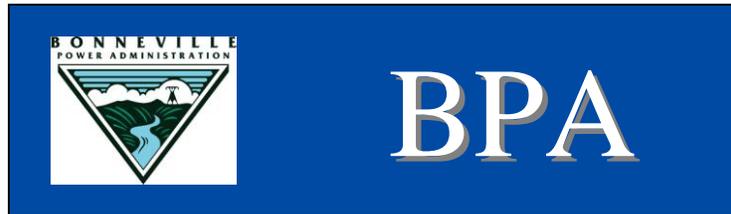


B O N N E V I L L E   P O W E R   A D M I N I S T R A T I O N



ELECTRICIAN FOREMAN III  
SKILL STANDARDS

December, 2006

Research Conducted by:

Alan Hardcastle, Senior Research Associate  
Social and Economic Sciences Research Center – Olympia  
Washington State University  
203 E. 4th Ave., Suite 521  
P.O. Box 43170  
Olympia, WA 98504-3170  
Ph: 360-586-2277 Fax: 360-586-2279

Terryll Bailey, Principal  
The Allison Group  
9016 Meridian Avenue North  
Seattle, WA 98103  
206-525-7175 FAX 206-129-1534

*THE ALLISON GROUP*

## **Table of Contents**

---

### **INTRODUCTION**

Skill Standards for BPA Occupations: Project Summary .....	5
A National Context for Skill Standards.....	5
What Are Skill Standards? .....	5
Why Are Skill Standards Important? .....	6
The Benefits and Uses of Skill Standards .....	6
Skill Standards to Curriculum: A Continuous Development Process .....	8
Pyramid of Competencies.....	10

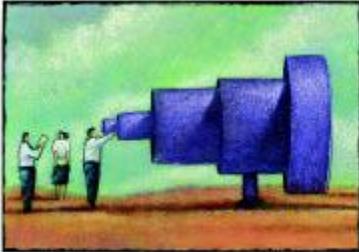
### **BPA SKILL STANDARDS PROJECT**

BPA Skill Standards Project Goals, Guidelines, and Methodology .....	12
Employability Skills: SCANS Profile .....	15
Definition of Terms .....	16

### **SKILL STANDARDS FOR ELECTRICIAN FOREMAN III**

Summary of Critical Work Functions and Key Activities .....	18
Skill Standards.....	20

# Introduction



## Skill Standards for BPA Occupations: Project Summary

- A National Context for Skill Standards
- What Are Skill Standards?
- Why Are Skill Standards Important?
- The Benefits and Uses of Skill Standards

## Skill Standards to Curriculum: A Continuous Development Process

## Pyramid of Competencies

## Skill Standards for BPA Occupations: Project Summary

---

This document contains background information and a complete set of industry-defined skill standards for a specific occupation at the Bonneville Power Administration (BPA). BPA sponsored the development of occupation-specific skill standards through this project for two key reasons: First, skill standards provide the specific information that BPA leadership needs to respond effectively to current knowledge and skill requirements of employees in specific occupations related to power generation. Second, skill standards will also enable BPA to better prepare for future skill gaps that may occur due to employee retirements, promotions and ongoing technological changes in the energy industry.

### A National Context for Skill Standards

The National Skill Standards Board was established by Congress in 1994 to encourage the creation and adoption of a national system of voluntary skill standards that would enhance the ability of the U.S. to compete effectively in a global economy. Since then, several national voluntary skill standards projects were developed by various industries in full partnership with education, labor and community-based organizations. The intent was to have voluntary skill standards that were flexible, portable, and could be continuously updated and improved.

Voluntary, industry based skill standards should be:

- Responsive to changing work organizations, technologies and market structure.
- Benchmarked to world-class levels of industry performance and free from gender, racial, or other forms of bias.
- Tied to measurable, competency-based outcomes that can be readily assessed.
- Inclusive of basic reading, writing, and critical thinking skills.
- Useful for qualifying new hires and continuously upgrading employees' skills.
- Applicable to a wide variety of education and training providers, both work and school-based.
- Based on a relatively simple structure to make the system user-friendly.
- A cooperative effort among all stakeholders.
- Developed independently of any single training/education provider or type of education/training provider.

*National Alliance of Business*

### What Are Skill Standards?

Skill standards are performance specifications that identify the knowledge, skills and abilities an individual needs to succeed in the workplace. They are critical to improving workforce skills, raising living standards, and improving the competitiveness of the U.S. economy. To be effective, skill standards must reflect the consensus of power generation professionals.

Skill standards provide measurable benchmarks of skill and performance achievement. They answer two critical questions: What do workers need to know and be able to do to succeed in today's workplace? And, how do we know when workers are performing well? Without this fundamental information, employers do not know whom to hire or where to focus their limited training dollars; employees and new entrants to the workforce do not know what they need to do

to improve their performance; educators do not know how to prepare students for the challenge of the workplace.

### **Why Are Skill Standards Important?**

In today's workplaces, the only constant is change. Jobs that once were relatively simple now require high performance work processes and enhanced skills. Because skill standards reflect changing workplace realities, they are a tool that can be used by applicants and employees to access greater career opportunities.

Updating skills and knowledge is now a lifelong endeavor, causing many employers and employees to spend more effort, time, and money on education and training. Skill standards provide benchmarks for making education and training decisions, shaping curricula, and directing funds toward highest value education and training investments.

### **The Benefits and Uses of Skill Standards**

Skill standards benefit all the stakeholders—business, labor, educators, government, and the community. The success of a skill standards development project and its usefulness to the community is dependent on the full participation and commitment of all stakeholders. These benefits can be used as a benchmark for evaluating the effectiveness of collaborative efforts.

### ***How Skill Standards Benefit Employers***

Employers can use skill standards to establish personnel qualification requirements. Interviews, performance reviews, and productivity can be evaluated and assessed to a higher degree of accuracy and efficacy. Employers are also able to identify core competencies and workers' abilities to demonstrate competencies. By matching competencies to critical work functions and key activities, employers can significantly improve efficiencies and productivity. Performance-based skill standards also provide a vehicle for varying degrees of job certainty and the structure for establishing competency-based pay scales. In addition, employers use skill standards to:

- Align personnel qualification requirements with nationally adopted certificates of competence.
- Modify employee training.
- Simplify measurement of employee training effectiveness.
- Assess employee skill levels based on industry standards.
- Match employee skills to the work needed.
- More easily document employee skills, training needs, and performance criteria.
- Improve consumer satisfaction and confidence through better developed evaluation skills for customer contact personnel.
- Improve employee satisfaction and morale by clarifying expectations.
- Improve quality, productivity, time-to-market and competitiveness.
- Achieve business goals.
- Partner with education and labor in developing school-to-work initiatives.

### ***How Skill Standards Benefit Workers***

Skill standards assist students in making career choices by providing industry expectations for success in the workplace. In addition, standards-based curriculum and assessments provide students with credentials that certify work-readiness. Work-ready students can anticipate being hired at higher rates of pay and can experience faster advancement in their chosen fields. Workers can accurately assess their skills against those required for career advancement and plan effectively for their career pathways. They can determine the skills and abilities needed for advancement or transfer within industries, and determine the continuous learning and training they need to upgrade their skills. In addition, students and workers can use skill standards to:

- Achieve clarity regarding what they are expected to learn and how to prepare for work.
- Enter and reenter the workforce with better control of their choices of high paying jobs requiring high skills.
- Accurately assess business expectations of the skills needed for positions and careers of their choice.
- Improve mobility and portability of their credentials.
- Obtain certification of competence of the skills they gain through experience, school, training, or self-study.
- Enhance their performance and achievement by self-evaluation against known standards.
- Be active contributors to the activities that make their organizations successful.

### ***How Skill Standards Benefit Labor Unions***

Labor unions can use skill standards to gain support for company-sponsored worker training programs and to identify career paths for workers within companies and industries. Unions can provide this information to union members and develop strategies to improve career mobility and stability. Skill standards help unions to:

- Improve member value to the company.
- Provide a greater worker voice in the company.
- Link skill standards to increased training and upward career mobility for union members.
- Assist employers to match employee skills to the work needed.
- Develop skills-based training and certification initiatives that complement union apprenticeship programs.
- Communicate effectively with employers about worker training and retraining needs.
- Cooperate with education and industry in developing school-to-work initiatives.

### ***How Skill Standards Benefit Educators***

Educators can identify core competencies and assessments based on the skill standards and implement them in their curricula. Students can then be required to demonstrate competency throughout their coursework. Academia and industry can build a cohesive relationship through a like-minded expectation of student competencies and work readiness. This enhances an instructor's ability to teach information consistent with industry's entry level expectations and needs. In addition, educators use skill standards to:

- Partner with business and labor in developing school-to-work initiatives.

- Provide effective, targeted instruction.
- Develop benchmarks for certificates of competence earned by students.
- Communicate what companies expect of employees.
- Develop new and evaluate existing curriculum and programs based on industry needs.
- Develop assessments to evaluate skills, knowledge, and abilities in classrooms and internships.
- Develop a common language on workforce preparation with business and labor.
- Improve relationships with local businesses, labor unions, other educators and agencies.
- Provide students with relevant career education and counseling.

### ***How Skill Standards Benefit Government***

Government can provide information that will ensure a better skill match between workers and employers and initiate education reform to better educate future members of the workforce. Skill standards better enable agencies to provide options for career and job mobility and link learning to the needs of the workplace. In addition, government can use skill standards to:

- Assist in the development of a highly skilled, high-quality, and competitive workforce and industry base.
- Evaluate the effectiveness of publicly funded education and training.
- Increase opportunities for under-represented populations by making public the information that defines the skills required for success, and by facilitating the national adoption of those definitions and their use.
- Support the creation of high performance organizations where they improve living standards for all members of the population.
- Facilitate collaboration between educators and industry.
- Communicate the need and basis for education reform to business, education, labor, and the community-at-large on both local and national levels.

### **Skill Standards to Curriculum: A Continuous Development Process**

The skill standards generated in this project are designed to be used by participating education partners to develop or modify curriculum at the high school and community college level. By providing the necessary input from industry, this skill standards document is a first step in curriculum development to serve the power generation industry in particular, and to demonstrate what can be done across industries.

In order to keep current with a rapidly changing workplace, standards need to be reevaluated and updated on a regular basis, with full partner participation at each step. New technological developments impact the ways that workers organize and apply their skills, including time management and interpersonal relationships. Increased technological complexity may simplify some of the job tasks but make others more intricate. Today's successful power generation workers are challenged to acquire a broader range of decision making and customer service skills as well as keep current with emerging technologies. Ongoing changes like these must be reflected in curriculum in order to meet the needs of industry, where expectations for workers are evolving.

## **A model of continuous improvement for economic development: Using Skill Standards**

### ***Step 1: Skill Standards Identification***

- Compile and research existing standards in related jobs and careers.
- Conduct focus groups to identify critical work functions and key activities, define key activity performance indicators, and identify technical knowledge, foundation skills, and personal qualities.
- Conduct a survey of current workers to determine level of SCANS skills required for each job.
- Develop work-related scenarios to place the skill standards in the context of the work environment.
- Verify the data gathered from focus groups.
- Disseminate skill standards information to involved parties from industry, education, and labor for their review and editing.

### ***Step 2: Curriculum Development***

- Identify necessary competencies based on the skill standards information and assessments.
- Develop program outcomes for specific academic and training programs, including Tech Prep, 2-year, and apprenticeship programs.
- Perform gap analysis to determine changes or additions to be made to curriculum.
- Revise existing curriculum to better meet the current and future needs of the industry.
- Develop new curriculum and establish new programs based on these competencies.

### ***Step 3: Articulation***

- Develop models to support the articulation of program outcomes and competencies between academic and training systems.
- Establish articulation agreements between existing programs to ensure portability of skills.
- Connect competencies and Certificates of Competence with benchmark documentation to ensure the portability of competencies across industry.

## **A Continuous Updating Process**

A continuous exercise is necessary: all partners must revise and verify skill standards on a regular basis. Curriculum and current training methods must be updated to meet workplace standards.

Individual workers must have access to clearly stated competency goals and direct access to skill development assistance. With cooperative effort on local and national levels, we can begin to resolve the workforce shortages in the power generation industry that face us today.

## Pyramid of Competencies

---

The Pyramid of Competencies is a depiction of skill standards in three broad skill categories.

### ***Tier I***

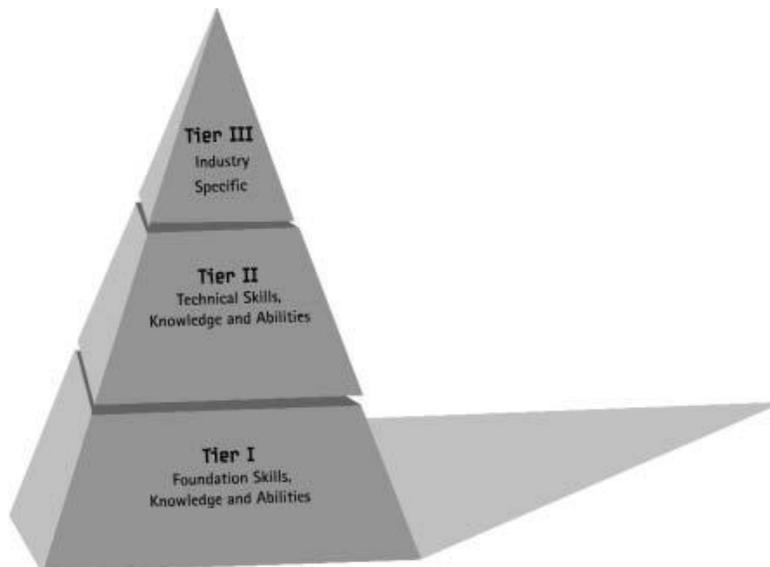
Tier I represents the broadest level of competencies, and is the set of employability (SCANS) skills, knowledge, abilities, and personal qualities required of all workers to be successful in today's workplace. These are the universal skills that are needed to apply technical knowledge and tools effectively.

### ***Tier II***

Tier II represents technical skills, knowledge, and abilities common to a cluster of jobs across all an industry. For workers at BPA, for example, knowledge of safe work practices would apply across all jobs.

### ***Tier III***

Tier III represents industry-specific technical skills, knowledge, and abilities that are unique to individual jobs and are the most prone to rapid change. For example, many workers need to upgrade their skills based on new technology.



# BPA Skill Standards Project



Project Goals, Guidelines and Methodology

Employability Skills: SCANS Profile

Definition of Terms

## **BPA Skill Standards Project Goals, Guiding Principles, and Methodology**

---

### **Goals**

- Identify voluntary skill standards for specific jobs at BPA.
- Disseminate the results and support the use of skill standards for the purposes of professional development.

### **Guiding Principles**

- Experienced workers are the experts in their career field and are best able to identify the work performed and the skills, knowledge, and abilities required to be successful.
- Business, labor, and education must work as partners to ensure the creation of a link between the work expectations and the curriculum.
- The standards must be consistent with existing civil rights laws and practices.
- Standards must be flexible, portable, and should be updated continuously.
- Skill standards describe the major functions and key activities, as well as the performance indicators, technical knowledge and skills, employability skills, and personal attributes needed to succeed in the workplace.
- Integrated skill standards define work duties and the skills required to perform them in the context of work settings.

The experience of the partners involved in this project holds that the success of any skill standards project is critically linked to the full participation and commitment of all partners.

### **Identification of Skill Standards: Research Methodology**

#### ***Background***

These BPA-defined skill standards were developed using specific research-based processes. The project followed the process required by the Washington State Board for Community and Technical Colleges (SBCTC) as described in *Skill Standards Guidebook I*, Washington State Board for Community and Technical Colleges, 1996 and the process developed by the National Skill Standards Board (NSSB). In particular, the protocols used for the ICT (Information Communications Technology) skill standards were applied to this project.

#### ***Focus Groups***

Focus groups of BPA subject matter experts were conducted. The panelists were selected for their expertise in their field, and every effort was made to include a variety of geographical areas. Panelists had a minimum of three years experience in the job, although most had 12 or more years experience.

A structured process was used to guide the panel through the development of the critical work functions and key activities. In each focus group, the process included the following elements:

- Panelists were facilitated by a professional skill standards focus group leader.
- Panelists received an orientation to skill standards. Examples were provided.
- Panelists arrived at consensus regarding the components of the skill standards.
- Panelists clarified the organization and structure of the critical work functions and key activities, filled in gaps, and confirmed the accuracy of the critical work functions and key activities.
- Panelists identified performance indicators for each key activity.
- Panelists identified occupational technical knowledge and skills for each key activity.
- Panelists brainstormed the topics that need to be covered in training and education programs to prepare people to enter the work.
- Panelists completed a survey to level SCANS skills (see below) and determined the top 5 to 7 SCANS skills for each key activity.

After a thorough orientation to skill standards, panelists were asked to brainstorm critical work functions for the job. After composing their own critical work functions, they were then provided with the draft critical work functions identified through research. Panelists were asked to compare the research-identified critical work functions with those they brainstormed as a group, and to consider the following criteria:

- Is the function a broad responsibility?
- Does it take a significant amount of time to achieve?
- Are there groupings of Key Activities associated with it?

Participants were asked to review the key activities for each critical work function, and to posit appropriate changes wherever necessary. The criteria used for this purpose were:

- Does the activity describe what you have to do to achieve this function?
- Is it a major area of task responsibility?
- Is it concrete and specific?
- Does it have relatively equal importance to the other Key Activities?
- Does each Key Activity require distinct, definable skills?

Once the critical work functions and key activities were finalized, performance indicators were developed for each key activity. Panelists were asked how they know when a task is performed well, and what elements need to be in place so they would be ensured that this key activity is performed competently. The following criteria were provided regarding performance indicators:

Performance Indicators should...

- Describe competent performance.
- Be directly observable, concrete and measurable.
- Capture the essential aspects of performance.
- Be as precise and explicit as possible but still apply to the job throughout the BPA.
- Reflect what the individual can control.

Panelists brainstormed performance indicators, and then arrived at consensus with respect to the final list. The group was assisted in putting the content into appropriate language format.

Panelists next moved to identify the occupational technical knowledge and skills for each key activity. They brainstormed occupational technical knowledge and skills, and then arrived at the final list through consensus. Panelists were asked what a person needs to know and be able to do to accomplish the key activity at the level defined by the performance indicators.

In each focus group an informal discussion was held to identify the subjects and topics most important for new entrants to the industry.

### *Surveys*

A survey was conducted to level SCANS skills and personal qualities for the job. SCANS (Secretary's Commission on Achieving Necessary skills) are foundation abilities required of workers in all occupations at varying levels specific to their jobs, ranging from basic academic skills to problem solving, working in teams, and the use of technology. Surveys were distributed to panelists in the focus groups and to workers across BPA. The SCANS survey results are in the Academic and Employability Knowledge and Skills column of the skill standards template.

**Employability Skills: SCANS Profile**

During the data-gathering process of this project, employability skills for BPA jobs were leveled. Employability, or workplace skills, are basic academic and foundation skills needed to build more advanced competencies. The foundation skills are based on broad workplace categories, known as SCANS (Secretary’s Commission on Achieving Necessary Skills, U.S. Department of Labor). This federal report issued in 1991 identifies 37 foundation and workplace competencies required for work readiness.

SCANS are comprised of a three-part foundation of skills and personal qualities and five workplace competencies needed for successful job performance in today’s workforce. Professionals currently working in the field were asked to identify the level of difficulty for each of the 37 SCANS skills most required for successful workplace performance in each job. The information in the charts on the following pages was compiled by taking a weighted average of the responses from workers in the specific job. This information provides the foundation for the employability skills within the skill standards.

**Basic Skills**

- Reading
- Writing
- Arithmetic
- Mathematics
- Listening
- Speaking

**Personal Qualities**

- Responsibility
- Self-worth
- Sociability
- Self-management
- Integrity/Honesty

**Thinking Skills**

- Creative Thinking
- Decision Making
- Problem Solving
- Visualization
- Knows/Learns
- Reasoning

**Workplace Competencies**

- Utilizing Resources
- Interpersonal Skills
- Utilizing Information
- Using Systems
- Using Technology

The *ADVANCE™ Workplace Standards Skill Inventory* from Advance Educational Spectrums, Inc. was used to capture industry views on foundation skills for power generation workers. Industry professionals ranked the SCANS skill levels required.<sup>1</sup>

<b>Applies creative thinking</b>	<b>Level I</b> • Makes connections between old and new • Recognizes patterns/relationships	<b>Level II</b> • Recognizes/understands comprehensive existing ideas • Identifies transferring techniques	<b>Level III</b> • Develops creative solutions • Applies creative solutions to new situations	<b>Level IV</b> • Generates unique solutions • Formulates new approaches • Organizes new processes/procedures	<b>Level V</b> • Judges/validates creativity
<b>Applies decision making strategies</b>	<b>Level I</b> • Understands decision making process • Recalls basic rules/principles • Identifies goals and constraints	<b>Level II</b> • Applies rules/principles to situations • Gathers information	<b>Level III</b> • Analyzes situations/introduces • Considers risks/implications • Completes multiple proposals	<b>Level IV</b> • Generates alternative solutions • Evaluates alternative solutions • Formulates plan of action	<b>Level V</b> • Judges consistency/feasibility • Justifies proposal/evaluates • Sets decision making parameters
<b>Recognizes and solves problems</b>	<b>Level I</b> • Identifies the problem	<b>Level II</b> • Understands the complexity/dynamics • Appropriately refers/completes/involves	<b>Level III</b> • Locates/frames/analyzes • Analyzes possible causes/solutions • Recommends action plan	<b>Level IV</b> • Generates/validates solutions • Develops/implements plan of action	<b>Level V</b> • Produces/validates plan of action • Judges effectiveness/efficiency of solution

Sample survey questions from the Advance Workplace Standards Skill Inventory

<sup>1</sup> The *Workplace Standards Skill Inventory* was used with permission from Centralia College through the State Board for Community and Technical Colleges, which holds a license agreement with Advance Educational Spectrums, Inc.

## **Definition of Terms**

---

Each chart in the following skill standards templates contains the following components:

### ***Academic and Employability Skills***

Employability skills are basic academic and personal skills that are needed to build more advanced competencies. They are competencies required by all workers in order to obtain meaningful work and participate in the modern workforce.

### ***Critical Work Functions***

Critical work functions represent the general areas of responsibility for the front-line worker in power generation. The functions tell us what must be done to achieve the key purpose of an occupation or job.

### ***Key Activities***

Key activities are the tasks performed by workers and related to the functional area of the job. They are made up of work activities which are measurable and observable, and which result in a decision, product or service.

### ***Performance Indicators***

Performance indicators are specific behavioral evidence of a worker's achievement of skills, knowledge, and task completion. The question answered is: "How do we know when this key activity is performed well?" Performance indicators provide the standard of performance required to produce the necessary outcomes of key activities.

### ***Technical Skills, Knowledge, Abilities and Tools***

Technical skills, knowledge, and abilities are those areas of expertise which workers must have in order to perform a given occupational task with excellence. A collection of skills, knowledge, abilities, and tools make up competencies.

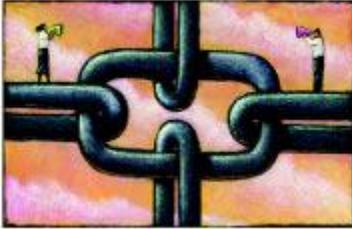
Skills refer to proficiency in an applied activity. This activity could be physical, mental, or interpersonal in nature.

Knowledge is a particular set of information.

Abilities are broad human characteristics that result from natural talent, training, or experience.

Tools are materials, equipment, and implements a worker must be able to use competently to meet the requirements of the job.

# Skill Standards for Electrician Foreman III



Summary of Critical Work Functions  
and Key Activities

Skill Standards

**Bonneville Power Administration  
Electrician Foreman III**

<b>Critical Work Functions</b>	<b>Key Activities</b>						
<b>A. Supervise Employees</b>	A1 <i>Identify skill gaps</i>	A2 <i>Provide training and ensure mandatory training</i>	A3 <i>Assign personnel</i>	A4 <i>Enforce EEO/HFWP compliance</i>	A5 <i>Review direct reports' performance and conduct, and identify recognition and/or corrective actions</i>	A6 <i>Develop and support career enhancement of direct reports</i>	
<b>B. Perform Planning and Scheduling</b>	B1 <i>Perform long range planning</i>	B2 <i>Perform short range planning and scheduling; respond to emergencies and schedule changes</i>	B3 <i>Coordinate work activity of crafts and crews</i>	B4 <i>Coordinate work projects (both expense and capital)</i>			
<b>C. Maintain a Safe Work Environment</b>	C1 <i>Provide safety training and participate in or chair safety meetings</i>	C2 <i>Monitor safety conditions</i>	C3 <i>Document inspection results and regulatory compliance</i>	C4 <i>Ensure compliance with safety and environmental regulations</i>	C5 <i>Identify and report unsafe conditions and take corrective action</i>		
<b>D. Perform Administrative Duties</b>	D1 <i>Communicate and coordinate with BPA management and direct reports</i>	D2 <i>Maintain records and reports</i>	D3 <i>Administer CPTC contract</i>	D4 <i>Conduct and maintain personal and agency property inventory</i>	D5 <i>Maintain working stocks of tools, equipment and supplies</i>	D6 <i>Communicate and coordinate with internal and external customers</i>	D7 <i>Manage budgets</i>
<b>E. Maintain Quality Control and Quality Assurance</b>	E1 <i>Supervise installation and replacement of electrical equipment and facilities</i>	E2 <i>Supervise maintenance of electrical equipment and facilities</i>	E3 <i>Supervise repair of electrical equipment and facilities</i>				

**Job: Electrician Foreman III**  
**Critical Work Function: A. Supervise Employees**

KEY ACTIVITY	<i>Performance Indicators</i> How do we know when the task is performed well?	<i>Technical Knowledge</i> Skills, Abilities, Tools	<i>Employability Skills</i> SCANS Skills and Foundational Abilities
<p>A1. <i>Identify skill gaps</i></p>	<ul style="list-style-type: none"> <li>• Skill gaps are relevant to the individual’s job performance and career development.</li> <li>• Skill gaps are communicated to the individual in an effective and timely manner.</li> <li>• Skill gaps are identified based on observation of the individual’s work.</li> <li>• Remediation is planned and discussed with the individual.</li> <li>• When appropriate, attendance at training is required.</li> <li>• When appropriate, PIPs (performance improvement plan) are put in place.</li> <li>• Reports of skill gaps from other workers are appropriately investigated.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of the tasks required for jobs and the skills needed to perform them.</li> <li>• Knowledge of job standards for foremen, journeymen and apprentices.</li> <li>• Knowledge of training and HR (Human Resources) resources available for bridging skill gaps.</li> <li>• Knowledge of transmission system and equipment.</li> <li>• Knowledge of support services for managing employees.</li> <li>• Knowledge of operating bulletins, work standards and the APM (Accident Prevention Manual).</li> <li>• Knowledge of procedures for utilizing PIPs.</li> <li>• Ability to observe and evaluate job skill performance.</li> </ul>	<ul style="list-style-type: none"> <li>• Provides constructive feedback.</li> <li>• Works to improve team skills, encourages team members, assumes responsibility for accomplishing team goals, understands strengths/limitations and resolves conflicts.</li> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> <li>• Analyzes work assignments, assesses individual knowledge and skills, determines workload, monitors performance and proposes hiring/staffing adjustments.</li> <li>• Interprets, clarifies and influences communication and compares multiple viewpoints.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>A2.</b> <i>Provide training and ensure mandatory training</i></p>	<ul style="list-style-type: none"> <li>• When acting as trainer, information is accurately given, is relevant and is timely; questions are answered in a courteous and respectful manner; communication is concise and appropriate; proper terminology is used; participation of all is encouraged in an effective manner.</li> <li>• Mandatory trainings are attended by all direct reports.</li> <li>• Appropriate training personnel are scheduled to conduct trainings.</li> <li>• Other crafts are invited to attend trainings appropriate to their job performance.</li> <li>• Appropriate training opportunities are identified and communicated to direct reports.</li> <li>• Training is designed to meet defined objectives which are based on job tasks.</li> <li>• The effectiveness of training is measured by improved performance.</li> <li>• Work schedules are coordinated to meet training schedule.</li> <li>• Alternative options for training providers and locations are identified to meet time and get needs and constraints.</li> <li>• Trainings are brought to the whole group when appropriate.</li> <li>• Apprentices receive the training required for their advancement, and mentoring is provided as appropriate.</li> <li>• Training for succession planning is identified and recommended as appropriate.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of system, equipment, standards, policies and procedures of agency.</li> <li>• Knowledge of agency strategic business objectives.</li> <li>• Knowledge of which trainings are mandatory.</li> <li>• Knowledge of available training and training resources.</li> <li>• Knowledge of BPA terminology.</li> <li>• Knowledge of other crafts' work practices and job duties.</li> <li>• Ability to identify training opportunities.</li> <li>• Ability to identify technical training objectives.</li> <li>• Knowledge of training evaluation procedures.</li> <li>• Knowledge of training providers and how to access their information and the trainer scheduling process.</li> <li>• Knowledge of the apprentice program and requirements.</li> </ul>	<ul style="list-style-type: none"> <li>• Actively participates in discussion and presents complex ideas and information.</li> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> <li>• Analyzes work assignments, assesses individual knowledge and skills, determines workload, monitors performance and proposes hiring/staffing adjustments.</li> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> <li>• Identifies relevant details, facts, specifications, follows set of instructions and qualifies/analyzes information.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p>A3. <i>Assign personnel</i></p>	<ul style="list-style-type: none"> <li>• Individual skill sets and competences are matched to the requirements of the job.</li> <li>• Assignments are made so as to increase familiarity with substations in district.</li> <li>• When manpower shortages are encountered, procedures are followed to obtain personnel from other districts.</li> <li>• When assigning direct reports to teams, skill strengths and weaknesses are matched for maximum effectiveness to get the job done.</li> </ul>	<ul style="list-style-type: none"> <li>• Ability to match individuals to teams and match teams to tasks.</li> <li>• Knowledge of contents of CPTC (Columbia Power Trades Council) contract.</li> <li>• Knowledge of manpower requirements for outages.</li> <li>• Knowledge of process to coordinate with other districts to obtain personnel.</li> <li>• Knowledge of manpower requirements for emergency situations.</li> <li>• Knowledge of skills required for all jobs and ability to observe and assess job skill performance.</li> </ul>	<ul style="list-style-type: none"> <li>• Analyzes possible causes of problems, generates and evaluates solutions and devises and implements plan of action.</li> <li>• Analyzes work assignments, assesses individual knowledge and skills, determines workload, monitors performance and proposes hiring/staffing adjustments.</li> <li>• Analyzes situations and information, considers risks and implications, compiles multiple viewpoints, and generates alternative solutions.</li> <li>• Moderates discussion, interprets complaints and concerns, analyzes group dynamics, detects underlying issues and summarizes both sides of issues.</li> <li>• Uses logic to draw conclusions, analyzes rules and principles and examines information for relevance and accuracy.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>A4.</b> <b>Enforce EEO/HFWP* compliance</b> <i>* Equal Employment Opportunity / Harassment Free Work Place</i></p>	<ul style="list-style-type: none"> <li>• EEO and regulations are posted, supported and followed.</li> <li>• HFWP and EEO/Diversity mandatory trainings are attended by all personnel.</li> <li>• Complaints are followed up and appropriate action is taken in a timely manner in accordance with agency regulations.</li> <li>• Recruiting includes efforts to increase diversity.</li> <li>• Stated agency goals for EEO/HFWP are actively demonstrated and promoted.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of agency policies and thorough knowledge of employment regulations.</li> <li>• Ability to set expectations for personnel to meet EEO/HFWP goals.</li> <li>• Knowledge of HR (Human Resources) procedures, resources and personnel.</li> <li>• Knowledge of EEO regulations and HFWP policies.</li> <li>• Knowledge of recruiting techniques.</li> <li>• Knowledge of agency goals for EEO/HFWP.</li> </ul>	<ul style="list-style-type: none"> <li>• Recognizes the value of diversity and responsibly challenges discriminatory practices and procedures.</li> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> <li>• Understands the system organization and hierarchy, follows processes and procedures, and recognizes the organizational system strengths and limitations.</li> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> <li>• Analyzes situations and information, considers risks and implications, compiles multiple viewpoints, and generates alternative solutions.</li> <li>• Analyzes implications of decisions, responsibly challenges unethical practices and decisions and formulates ethical course of action.</li> <li>• Establishes rapport with co-workers and customers; modifies behavior to environment; shows understanding for others and encourages cooperation and negotiation.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>A5.</b> <i>Review direct reports' performance and conduct, and identify recognition and/or corrective actions</i></p>	<ul style="list-style-type: none"> <li>• Performance and conduct are consistently assessed, and strengths and weaknesses are communicated to direct reports in an effective manner.</li> <li>• Expectations for performance and conduct are clearly and accurately identified and concisely communicated.</li> <li>• Elements of fairness and consistency are applied in the performance appraisal process.</li> <li>• Deficiencies are addressed in an effective manner.</li> <li>• Successes are recognized and rewarded.</li> <li>• Apprentice evaluation reports are submitted in a timely manner and are complete and accurate.</li> <li>• Performance appraisals are completed in a thorough and timely manner.</li> <li>• Performance reviews are properly submitted and records are kept in accordance with agency policies and procedures.</li> <li>• Performance review is discussed with individuals in a courteous and respectful manner.</li> <li>• PIPs (performance improvement plans) are put in place in a timely manner when appropriate.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of tasks, projects, systems, facilities, agency goals and strategic objectives.</li> <li>• Knowledge of the difference between performance and conduct.</li> <li>• Ability to observe and assess conduct and job skill performance.</li> <li>• Ability to identify clear expectations for performance and conduct.</li> <li>• Knowledge of performance review policies and procedures.</li> <li>• Knowledge of apprentice evaluation reports.</li> <li>• Knowledge of all resources available in BPA's recognition program</li> <li>• Knowledge of disciplinary process.</li> <li>• Knowledge of procedures for implementing PIPs.</li> </ul>	<ul style="list-style-type: none"> <li>• Selects data relevant to the task, predicts outcomes, analyzes data and integrates multiple items of data.</li> <li>• Uses logic to draw conclusions, analyzes rules and principles and examines information for relevance and accuracy.</li> <li>• Works to improve team skills, encourages team members, assumes responsibility for accomplishing team goals, understands strengths/limitations and resolves conflicts.</li> <li>• Summarizes, integrates and analyzes information.</li> <li>• Analyzes implications of decisions, responsibly challenges unethical practices and decisions and formulates ethical course of action.</li> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>A6</b> <i>Develop and support career enhancement of direct reports</i></p>	<ul style="list-style-type: none"> <li>• Career advancement opportunities are accurately identified for the direct report.</li> <li>• Work with employee on development and implementation of IDP (individual development plan).</li> <li>• Mentoring and upgrade opportunities are provided to employees.</li> <li>• Awareness of information is maintained to facilitate and promote relevant opportunities for training and development for direct reports.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of career paths and advancement opportunities available within department and BPA.</li> <li>• Knowledge of IDP's and implementation processes and resources.</li> <li>• Knowledge of mentoring and upgrade opportunities for employees.</li> <li>• Knowledge of sources of information for training and development opportunities.</li> </ul>	<ul style="list-style-type: none"> <li>• Analyzes work assignments, assesses individual knowledge and skills, determines workload, monitors performance and proposes hiring/staffing adjustments.</li> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> <li>• Interprets and applies new knowledge and experience and analyzes application of learning tools.</li> <li>• Works to improve team skills, encourages team members, assumes responsibility for accomplishing team goals, understands strengths/limitations and resolves conflicts.</li> </ul>

## Job: Electrician Foreman III

### Critical Work Function: B. Perform Planning and Scheduling

KEY ACTIVITY	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>B1.</b> <i>Perform long range planning</i></p> <p><i>*Long Range planning = over 45 Days</i></p>	<ul style="list-style-type: none"> <li>• Knowledge of system, equipment and district facilities is kept up to date.</li> <li>• Resources and material needs required for equipment maintenance are accurately identified and available in an appropriate time frame.</li> <li>• Requests for outages are proposed in an appropriate time frame in accordance with maintenance schedule or work plan.</li> <li>• Outages are consolidated whenever possible to minimize outage duration and frequency.</li> <li>• Overtime is minimized.</li> <li>• Coordination and communication with outage office, RMS (Resource Management Specialist), customers and other crafts is maintained in a timely manner.</li> <li>• Seasonal loading and system constraints are factored into outage requests in support of grid reliability.</li> <li>• COMPASS (Coordinated Outage Management, Planning, and Scheduling System) and BES (Business Enterprise System) are correctly utilized when required.</li> </ul>	<ul style="list-style-type: none"> <li>• Ability to use coordinated work plan to identify resources and work loads.</li> <li>• Ability to consolidate and prioritize outages.</li> <li>• Knowledge of system, equipment and district facilities.</li> <li>• Knowledge of resources, materials and tools required for equipment maintenance, upgrade or installation.</li> <li>• Knowledge of ordering procedures and lead times for obtaining parts and equipment.</li> <li>• Knowledge of other crafts' work practices.</li> <li>• Knowledge of outage proposal formats and procedures.</li> <li>• Knowledge of the long range outage planning process.</li> <li>• Knowledge of the roles and concerns of the outage office, RMS, and other crafts.</li> <li>• Knowledge of customers' systems, safety and operating procedures and organizational structure.</li> <li>• Knowledge of seasonal loading and system constraints.</li> <li>• Knowledge of COMPASS and BES.</li> <li>• Knowledge of impact of communication path outages.</li> </ul>	<ul style="list-style-type: none"> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> <li>• Selects data relevant to the task, predicts outcomes, analyzes data and integrates multiple items of data.</li> <li>• Analyzes work assignments, assesses individual knowledge and skills, determines workload, monitors performance and proposes hiring/staffing adjustments.</li> <li>• Effectively manages time; prepares and organizes multiple schedules and manages timelines and recommends timeline adjustments.</li> <li>• Maintains inventory, monitors safe and efficient utilization of materials and identifies future material needs.</li> <li>• Performs routine recordkeeping, reconciles accounts and develops budget proposals.</li> <li>• Analyzes situations and information, considers risks and implications, compiles multiple viewpoints, and generates alternative solutions.</li> <li>• Suggests system modifications/improvements and determines system components to be improved.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>B2.</b> <i>Perform short range planning and scheduling; respond to emergencies and schedule changes</i></p>	<ul style="list-style-type: none"> <li>• Availability of manpower is ensured when scheduling work.</li> <li>• Emergencies and schedule changes are appropriately and effectively incorporated into the short range plan.</li> <li>• Resources and material needs required for equipment maintenance are accurately identified and available in an appropriate time frame.</li> <li>• Other crafts are made aware of the work schedule in a timely manner.</li> <li>• Requests for outages are proposed in an appropriate time frame.</li> <li>• Outages are consolidated whenever possible to minimize outage duration and frequency.</li> <li>• Overtime is minimized.</li> <li>• Coordination and communication with outage office, RMS (Resource Management Specialist), customers and other crafts is maintained in a timely manner.</li> <li>• Seasonal loading and system constraints are factored into outage requests in support of grid reliability.</li> <li>• Unplanned outages are utilized for planned work whenever possible.</li> <li>• Priorities are set and changed as needed to meet the requirements of the system.</li> <li>• COMPASS (Coordinated Outage Management, Planning, and Scheduling System) and BES (Business Enterprise System) are correctly utilized when required.</li> </ul>	<ul style="list-style-type: none"> <li>• Ability to use coordinated work plan to identify resources and work loads.</li> <li>• Knowledge of the number of hours required to complete a task or a project.</li> <li>• Knowledge of system, equipment and district facilities.</li> <li>• Knowledge of ordering procedures and lead times for obtaining parts and equipment.</li> <li>• Ability to adjust short range plan to meet emergencies and schedule changes.</li> <li>• Knowledge of resources, materials and tools required for equipment maintenance, repair, upgrade or installation.</li> <li>• Knowledge of other crafts' work practices or job duties.</li> <li>• Knowledge of outage proposal formats and procedures.</li> <li>• Ability to consolidate and prioritize outages.</li> <li>• Knowledge of seasonal loading and system constraints.</li> <li>• Knowledge of effects of outages on transmission grid reliability and availability.</li> <li>• Knowledge of impact of communication path outages.</li> <li>• Knowledge of the roles and concerns of the outage office, RMS, and other crafts.</li> <li>• Knowledge of customers' systems, safety and operating procedures and organizational structure.</li> <li>• Knowledge of overtime as a resource.</li> <li>• Knowledge of availability of materials and resources.</li> <li>• Knowledge of COMPASS and BES (Business Enterprise System).</li> </ul>	<ul style="list-style-type: none"> <li>• Analyzes possible causes of problems, generates and evaluates solutions and devises and implements plan of action.</li> <li>• Interprets and applies new knowledge and experience and analyzes application of learning tools.</li> <li>• Analyzes work assignments, assesses individual knowledge and skills, determines workload, monitors performance and proposes hiring/staffing adjustments.</li> <li>• Selects data relevant to the task, predicts outcomes, analyzes data and integrates multiple items of data.</li> <li>• Monitors system performance, analyzes system operation, distinguishes trends in performance and diagnoses performance deviations.</li> <li>• Performs basic computations and measurements, converts numerical data and predicts arithmetic results.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>B3</b> <i>Coordinate work activity of crafts and crews</i></p>	<ul style="list-style-type: none"> <li>• Project requirements, goals and timelines are communicated to crafts and crew members in a clear and concise manner.</li> <li>• Availability of materials, equipment, tools and personnel is ensured.</li> <li>• Personnel are appropriately assigned based on expertise, strengths and weakness.</li> <li>• Efficient use of materials, equipment and personnel is maximized.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of system conditions and priorities.</li> <li>• Knowledge of other crafts' work practices or job duties.</li> <li>• Knowledge of the number of hours required for each craft to do a task or a project.</li> <li>• Knowledge of how to obtain system averages and coordinated work plan.</li> <li>• Knowledge of materials, tools, equipment and personnel required to complete a task.</li> <li>• Knowledge of location of reports on previous projects and how to analyze and apply information from reports.</li> <li>• Knowledge of project requirements, goals and timelines.</li> <li>• Ability to observe and assess job skills.</li> <li>• Ability to maximize efficient use of materials, equipment, and personnel.</li> </ul>	<ul style="list-style-type: none"> <li>• Provides constructive feedback and develops appropriate training procedures.</li> <li>• Uses logic to draw conclusions, analyzes rules and principles and examines information for relevance and accuracy.</li> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> <li>• Establishes rapport with co-workers and customers; modifies behavior to environment; shows understanding for others and encourages cooperation and negotiation.</li> <li>• Moderates discussion, interprets complaints and concerns, analyzes group dynamics, detects underlying issues and summarizes both sides of issues.</li> <li>• Effectively manages time; prepares and organizes multiple schedules and manages timelines and recommends timeline adjustments.</li> <li>• Actively participates in discussion and presents complex ideas and information.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>B4</b> <i>Coordinate Work Projects (both expense and capital)</i></p>	<ul style="list-style-type: none"> <li>• The correct prints, bills of materials, and all required documents are in hand.</li> <li>• Coordination and communication with project manager, crafts, crews, RMS (Resource Management Specialists), factory representatives and internal and external customers is clear and effective.</li> <li>• Timelines are completed and updated as required.</li> <li>• Priorities of projects are set and updated based on material availability, craft availability, outage schedule, maintenance needs, design availability, contracts with customers, environmental compliance, weather, system conditions, Matrix Team, safety and other factors as determined by the situation.</li> <li>• Projects are completed on time and to specification.</li> <li>• Pre-staging is properly performed prior to outages.</li> <li>• Efficiency of use of materials, equipment and personnel is maximized.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of project priorities, timelines, goals, and budgets and overall scope of the work.</li> <li>• Ability to analyze project data and track project progress.</li> <li>• Knowledge of the typical number of hours it takes to do a task or a project.</li> <li>• Ability to use BES (Business Enterprise System).</li> <li>• Knowledge of pre staging procedures and processes.</li> <li>• Knowledge of roles and functions of project manager, crafts, crews, RMS, factory representatives and internal and external customers.</li> <li>• Knowledge of system equipment and district facilities.</li> <li>• Knowledge of contacts in internal and external organizations.</li> <li>• Knowledge of typical challenges in managing project timelines, equipment, and personnel.</li> <li>• Knowledge of availability of materials, tools and crafts.</li> <li>• Knowledge of outage schedule and maintenance needs.</li> <li>• Knowledge of design availability.</li> <li>• Knowledge of customer contracts and requirements and environmental compliance.</li> <li>• Knowledge of the impact of weather on projects and the system.</li> <li>• Knowledge of safety procedures and policies.</li> <li>• Knowledge of Matrix Team role in planning projects.</li> <li>• Knowledge of project specification terminology, diagrams, documents, and schematics.</li> </ul>	<ul style="list-style-type: none"> <li>• Effectively manages time; prepares and organizes multiple schedules and manages timelines and recommends timeline adjustments.</li> <li>• Utilizes previous training and experience to predict outcomes; visually analyzes relationship between parts/whole and process/procedure and interprets charts and graphs.</li> <li>• Understands the system organization and hierarchy, follows processes and procedures, and recognizes the organizational system strengths and limitations.</li> <li>• Selects data relevant to the task, predicts outcomes, analyzes data and integrates multiple items of data.</li> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> <li>• Actively participates in discussion and presents complex ideas and information.</li> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> </ul>

**Job: Electrician Foreman III**

**Critical Work Function: C. Maintain a Safe Work Environment**

KEY ACTIVITY	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><i>C1.</i>                      Provide safety training and participate in or chair safety meetings</p>	<ul style="list-style-type: none"> <li>• Training includes safety policies and procedures pertinent to direct reports' jobs and reviews of lessons learned and accidents.</li> <li>• Training is clear and concise and starts and ends on time.</li> <li>• Safety meeting agendas are prepared in advance and safety meeting protocols are followed.</li> <li>• Safe work practices are clearly communicated.</li> <li>• Participation of all is encouraged in an effective manner.</li> <li>• All communications in trainings and meetings are respectful.</li> <li>• Appropriate training personnel/guest speakers are scheduled.</li> <li>• Other crafts are invited to attend trainings appropriate to their job performance.</li> <li>• Training has defined objectives which are based on job tasks.</li> <li>• The effectiveness of training is measured by improved safety record.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of safety policies and procedures and safe work practices.</li> <li>• Ability to identify safety training objectives.</li> <li>• Knowledge of other crafts' work practices or job duties.</li> <li>• Knowledge of the organization's safety goals and targets.</li> <li>• Knowledge of the organization's safety structure, and Safety Office roles and responsibilities.</li> <li>• Ability to analyze safety record statistics.</li> <li>• Knowledge of APM (Accident Prevention Manual) and Safety and Health Program Handbook.</li> </ul>	<ul style="list-style-type: none"> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> <li>• Understands the requirements of the task and technological results and analyzes task/technology relationship.</li> <li>• Works to improve team skills, encourages team members, assumes responsibility for accomplishing team goals, understands strengths/limitations and resolves conflicts.</li> <li>• Interprets and applies new knowledge and experience and analyzes application of learning tools.</li> <li>• Utilizes integrated software, utilizes networks and manipulates information.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>C2.</b> <i>Monitor safety conditions</i></p>	<ul style="list-style-type: none"> <li>• Hazards are correctly identified.</li> <li>• Safety deficiencies are identified and corrected in a timely manner.</li> <li>• Routine tests / inspections are conducted on all safety equipment.</li> <li>• Inspections meet all applicable regulations.</li> <li>• Safety concerns are communicated to appropriate personnel effectively and in a timely manner.</li> <li>• Inspections include security equipment and protocols.</li> <li>• Protocols are followed for OSHA (Occupational Safety and Health Administration) inspections.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of safe operating conditions and the ability to recognize hazards.</li> <li>• Knowledge of corrective actions and facility resources for correcting safety deficiencies.</li> <li>• Knowledge of security protocols, challenges, and equipment.</li> <li>• Knowledge of routine tests and inspections required on safety equipment.</li> <li>• Knowledge of BPA procedures when performing OSHA inspections.</li> </ul>	<ul style="list-style-type: none"> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> <li>• Selects data relevant to the task, predicts outcomes, analyzes data and integrates multiple items of data.</li> <li>• Sets well defined goals, applies self management skills and appropriately modifies goals.</li> <li>• Analyzes possible causes of problems, generates and evaluates solutions and devises and implements plan of action.</li> <li>• Monitors system performance, analyzes system operation, distinguishes trends in performance and diagnoses performance deviations.</li> <li>• Actively participates in discussion and presents complex ideas and information.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>C3.</b> <i>Document inspection results and regulatory compliance</i></p>	<ul style="list-style-type: none"> <li>• Documentation is performed according to agency policies and procedures.</li> <li>• Reports and appropriate records are input into database, filed and distributed to correct parties.</li> <li>• Documentation is relevant, understandable and accurate.</li> <li>• Correct terminology and abbreviations are used.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of power utility industry terminology, abbreviations and acronyms.</li> <li>• Knowledge of agency procedures and documentation protocols.</li> <li>• Knowledge of mandatory documentation for regulatory compliance.</li> </ul>	<ul style="list-style-type: none"> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> <li>• Records information accurately, creates original documents and summarizes information.</li> <li>• Analyzes situations and information, considers risks and implications, compiles multiple viewpoints, and generates alternative solutions.</li> <li>• Utilizes integrated software, utilizes networks and manipulates information.</li> <li>• Analyzes implications of decisions, responsibly challenges unethical practices and decisions and formulates ethical course of action.</li> </ul>
<p><b>C4.</b> <i>Ensure compliance with safety and environmental regulations</i></p>	<ul style="list-style-type: none"> <li>• Safety and OSHA (Occupational Safety and Health Administration) regulations are posted, supported and followed.</li> <li>• Deficiencies are followed up and appropriate action is taken in a timely manner in accordance with agency regulations.</li> <li>• Job hazards are accurately identified and clearly discussed prior to starting the job.</li> <li>• Mandatory training and certification requirements for emergency, first aid and CPR (cardiopulmonary resuscitation) procedures are met for all personnel.</li> <li>• Emergency response complies with regulatory policies and procedures.</li> <li>• Proper PPE (personal protective equipment) is available and used by all personnel.</li> <li>• Safety and environmental expectations are communicated to all personnel effectively and in a timely manner.</li> <li>• Safety proctors are properly supported in their duties including release time for safety proctor activities.</li> <li>• Clearance certification is properly maintained.</li> </ul>	<ul style="list-style-type: none"> <li>• Ability to identify an unsafe condition.</li> <li>• Knowledge of safety rules and regulations.</li> <li>• Knowledge of the equipment, conditions and procedures for working safely in a facility.</li> <li>• Knowledge of procedures for taking corrective actions.</li> <li>• Knowledge of operating bulletins and work standards.</li> <li>• Knowledge of mandatory training and certification requirements.</li> <li>• Ability to perform job hazard analysis.</li> <li>• Knowledge of emergency policies and procedures and ability to use emergency equipment.</li> <li>• Knowledge of PPE requirements.</li> <li>• Knowledge of safety proctor program and responsibilities.</li> <li>• Knowledge of clearance certification procedures and APM (Accident Prevention Manual) and OB2 (Operating Bulletin 2).</li> </ul>	<ul style="list-style-type: none"> <li>• Understands the system organization and hierarchy, follows processes and procedures, and recognizes the organizational system strengths and limitations.</li> <li>• Interprets and applies new knowledge and experience and analyzes application of learning tools.</li> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>C5.</b> <i>Identify and report unsafe conditions and take corrective action</i></p>	<ul style="list-style-type: none"> <li>• Threats to health and safety are identified, reported, and documented promptly.</li> <li>• Corrective actions are identified and taken promptly.</li> <li>• Documentation is completed once corrective actions are taken.</li> <li>• Appropriate parties (including customers) are consulted about corrective actions.</li> <li>• Follow-up procedures are conducted to ensure corrective actions are properly taken.</li> </ul>	<ul style="list-style-type: none"> <li>• Ability to identify threats to health and safety.</li> <li>• Knowledge of corrective actions and reporting procedures for unsafe conditions.</li> <li>• Knowledge of roles and responsibilities of personnel at BPA.</li> <li>• Knowledge of customer procedures and contact personnel.</li> </ul>	<ul style="list-style-type: none"> <li>• Analyzes possible causes of problems, generates and evaluates solutions and devises and implements plan of action.</li> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> <li>• Analyzes situations and information, considers risks and implications, compiles multiple viewpoints, and generates alternative solutions.</li> <li>• Summarizes, integrates and analyzes information.</li> <li>• Defends own viewpoints, accepts responsibility for own behavior, understands own impact on others and demonstrates self confidence, self reliance, and self discipline.</li> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> </ul>

**Job: Electrician Foreman III**  
**Critical Work Function: D. Perform Administrative Duties**

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><i>D1.</i>  <i>Communicate and coordinate with BPA management and direct reports</i></p>	<ul style="list-style-type: none"> <li>• Manager is kept informed of relevant events.</li> <li>• Managers are consulted on matters of personnel and budget.</li> <li>• BPA policies, goals and targets are clearly communicated and supported with direct reports.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of BPA policies, mission, vision, goals and targets.</li> <li>• Ability to determine when to consult with Manager.</li> <li>• Knowledge of budget requirements.</li> </ul>	<ul style="list-style-type: none"> <li>• Defends own viewpoints, accepts responsibility for own behavior, understands own impact on others and demonstrates self confidence, self reliance, and self discipline.</li> <li>• Records information accurately, creates original documents and summarizes information.</li> <li>• Uses logic to draw conclusions, analyzes rules and principles and examines information for relevance and accuracy.</li> <li>• Interprets, clarifies and influences communication and compares multiple viewpoints.</li> <li>• Understands the system organization and hierarchy, follows processes and procedures, and responds to system demand.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><i>D2.</i> <i>Maintain records and reports</i></p>	<ul style="list-style-type: none"> <li>• Records and reports are accurate and are filed in proper locations.</li> <li>• Records and reports are submitted in a timely manner to appropriate personnel and departments.</li> <li>• Records and reports are maintained in accordance with all applicable policies and regulations.</li> <li>• Personnel files and OUO (official use only) files are secured in accordance with agency policies and procedures.</li> <li>• Entries into BES (Business Enterprise System) are accurate.</li> <li>• Accounting is appropriately and accurately charged.</li> <li>• Travel expenses, authorization for travel, P-Card, timesheets, leave requests and overtime requests are properly approved and submitted.</li> <li>• Completion reports are completed and submitted to Construction Manager and Chief Substation Operators at the end of each construction project.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of reporting requirements for facilities and districts.</li> <li>• Knowledge of policies and regulations regarding records and reports.</li> <li>• Knowledge of security and retention protocols for records and files.</li> <li>• Knowledge of BES system.</li> <li>• Knowledge of expense authorization procedures.</li> <li>• Knowledge of reasonable time frames to travel to and perform jobs.</li> <li>• Knowledge of travel regulations, authorization for travel, P-Card, leave requests and overtime requests approval and submittal procedures.</li> <li>• Knowledge of time and attendance reporting and approval procedures.</li> <li>• Knowledge of completion report forms and procedures.</li> </ul>	<ul style="list-style-type: none"> <li>• Selects data relevant to the task, predicts outcomes, analyzes data and integrates multiple items of data.</li> <li>• Interprets information and transfers information between formats.</li> <li>• Utilizes integrated software, utilizes networks and manipulates information.</li> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> <li>• Records information accurately, creates original documents and summarizes information.</li> <li>• Performs basic computations and measurements, converts numerical data and predicts arithmetic results.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><i>D3.</i> <i>Administer CPTC* contract</i></p> <p><i>* CPTC – Columbia Power Trades Council</i></p>	<ul style="list-style-type: none"> <li>• Compliance with terms of the contract is ensured.</li> <li>• No intentional contract violations occur.</li> <li>• Disputes are settled on the first level whenever possible.</li> <li>• Work load is scheduled so as to minimize penalties.</li> <li>• File of memorandums of understanding and letters of clarification are maintained.</li> </ul>	<ul style="list-style-type: none"> <li>• Detailed knowledge of CPTC contract and MOU's (memorandum of understanding).</li> <li>• Knowledge of dispute settlement processes.</li> <li>• Knowledge of workload scheduling strategies.</li> <li>• Knowledge of contacts for resolution of disputes, concerns, and misunderstandings.</li> <li>• Knowledge of crafts' job standards.</li> </ul>	<ul style="list-style-type: none"> <li>• Moderates discussion, interprets complaints and concerns, analyzes group dynamics, detects underlying issues and summarizes both sides of issues.</li> <li>• Uses logic to draw conclusions, analyzes rules and principles and examines information for relevance and accuracy.</li> <li>• Analyzes possible causes of problems, generates and evaluates solutions and devises and implements plan of action.</li> <li>• Analyzes implications of decisions, responsibly challenges unethical practices and decisions and formulates ethical course of action.</li> <li>• Defends own viewpoints, accepts responsibility for own behavior, understands own impact on others and demonstrates self confidence, self reliance, and self discipline.</li> <li>• Recognizes the value of diversity and responsibly challenges discriminatory practices and procedures.</li> </ul>
<p><i>D4.</i> <i>Conduct and maintain personal and agency property inventory</i></p>	<ul style="list-style-type: none"> <li>• All assigned equipment is successfully accounted for.</li> <li>• Inventory is conducted annually and in accordance with agency policies.</li> <li>• Inventory is submitted to appropriate personnel and departments in a timely manner.</li> <li>• Inventory is accurate and complete.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of Sunflower software program for personal property inventory.</li> <li>• Knowledge of policies regarding annual personal property inventory.</li> <li>• Knowledge of inventory submittal procedures.</li> <li>• Ability to track equipment.</li> </ul>	<ul style="list-style-type: none"> <li>• Maintains inventory, monitors safe and efficient utilization of materials and identifies future material needs.</li> <li>• Utilizes integrated software, utilizes networks and manipulates information.</li> <li>• Pays attention to details, demonstrates initiative, monitors performance standards and follows up on assigned tasks.</li> <li>• Analyzes work assignments, assesses individual knowledge and skills, determines workload, monitors performance and proposes hiring/staffing adjustments.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>D5</b> <i>Maintain working stocks of tools, equipment and supplies</i></p>	<ul style="list-style-type: none"> <li>• Sufficient stocks of supplies are maintained.</li> <li>• Orders are placed in a timely manner.</li> <li>• Proper and accurate purchasing records are maintained.</li> <li>• Tools, equipment and supplies are kept in an orderly and accessible manner.</li> <li>• Maintenance and inspections are performed on tools and equipment as required.</li> <li>• Required forms and equipment are stocked in all vehicles.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of tool and equipment inspection and maintenance policies and procedures.</li> <li>• Knowledge of forms, supplies, tools and equipment required for effective operation.</li> <li>• Knowledge of purchasing procedures.</li> </ul>	<ul style="list-style-type: none"> <li>• Maintains inventory, monitors safe and efficient utilization of materials and identifies future material needs.</li> <li>• Performs routine recordkeeping, reconciles accounts and develops budget proposals.</li> <li>• Analyzes situations and information, considers risks and implications, compiles multiple viewpoints, and generates alternative solutions.</li> </ul>
<p><b>D6</b> <i>Communicate and coordinate with internal and external customers</i></p>	<ul style="list-style-type: none"> <li>• Information is accurately given, received and understood is appropriate to the situation and is timely.</li> <li>• Internal and external customer issues are accurately and thoroughly discussed and solutions are defined.</li> <li>• Oral and written communication is concise and courteous.</li> <li>• Proper terminology is used to communicate with internal and external organizations and personnel.</li> <li>• Standards of conduct are observed when communicating with external organizations.</li> <li>• Organizations are referred to the public relations department when appropriate.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of industry, facility/plant, agency, system, equipment, scientific, technical, tool, safety, and personnel terminology.</li> <li>• Knowledge of standards of conduct (i.e. company policies regarding required and allowable communications).</li> <li>• Ability to locate and use communications devices such as telephones, radios, PA systems, email, and postal system.</li> <li>• Ability to identify and report internal and external customer issues.</li> </ul>	<ul style="list-style-type: none"> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> <li>• Actively participates in discussion and presents complex ideas and information.</li> <li>• Records information accurately, creates original documents and summarizes information.</li> <li>• Uses logic to draw conclusions, analyzes rules and principles and examines information for relevance and accuracy.</li> <li>• Establishes rapport with co-workers and customers; modifies behavior to environment; shows understanding for others and encourages cooperation and negotiation.</li> <li>• Moderates discussion, interprets complaints and concerns, analyzes group dynamics, detects underlying issues and summarizes both sides of issues.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><i>D7</i> <i>Manage budgets</i></p>	<ul style="list-style-type: none"> <li>• Materials, overtime, tool and training budgets are managed so as to minimize costs and maximize efficiency.</li> <li>• Budget reports are reviewed to ensure that costs are correctly allocated, and errors are corrected.</li> <li>• Variances from budget are justified, documented and submitted to management.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of materials, overtime, tool and training budgets.</li> <li>• Knowledge of budget reports and how to analyze them.</li> <li>• Knowledge of procedures for correcting accounting errors.</li> <li>• Ability to justify variances from budget.</li> </ul>	<ul style="list-style-type: none"> <li>• Analyzes situations and information, considers risks and implications, compiles multiple viewpoints, and generates alternative solutions.</li> <li>• Performs basic computations and measurements, converts numerical data and predicts arithmetic results.</li> <li>• Analyzes implications of decisions, responsibly challenges unethical practices and decisions and formulates ethical course of action.</li> <li>• Utilizes integrated software, utilizes networks and manipulates information.</li> <li>• Uses logic to draw conclusions, analyzes rules and principles and examines information for relevance and accuracy.</li> <li>• Uses mathematical processes and interprets mathematical data.</li> </ul>

## Job: Electrician Foreman III

### Critical Work Function: E. Maintain Quality Control and Quality Assurance

KEY ACTIVITY	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<b>E1</b> Supervise installation and replacement of electrical equipment and facilities	<ul style="list-style-type: none"> <li>• Communications regarding the make-up of the installation team and pertinent task information are made to appropriate personnel effectively and in a timely manner.</li> <li>• Removal and installation of equipment is performed safely and in accordance with all policies and procedures.</li> <li>• Removal and installation of equipment is completed to specifications and in a timely manner.</li> <li>• Plan of action is consistently updated to accommodate required adjustments and direction is provided to direct reports effectively and in a timely manner.</li> <li>• Customers and support crafts are appropriately involved.</li> <li>• Installation is properly documented on weekly progress reports and completion reports which are submitted to appropriate personnel in a timely manner.</li> <li>• Solutions to problems are correctly identified and implemented in a timely manner.</li> <li>• Worksite is kept in an orderly condition.</li> <li>• Calibration, certification, and proper maintenance of tools are ensured.</li> <li>• All required tools, equipment and materials for the job are available and in a safe and proper working order.</li> <li>• Prints and manufacturer's performance specifications are consulted as necessary.</li> <li>• Prints are updated to reflect current status of equipment in a timely manner.</li> <li>• Recommendations for acquisition of new tools are made to appropriate personnel.</li> <li>• Following installation, equipment is tested to ensure proper function.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of equipment installation and removal procedures.</li> <li>• Knowledge of safety equipment and, safe work practices, policies and procedures and the ability to identify unsafe conditions.</li> <li>• Knowledge of the knowledge, skills, and abilities required to complete job tasks.</li> <li>• Ability to implement and follow a plan of action and to modify the plans of action as needed.</li> <li>• Ability to understand and follow manufacturers' installation requirements and recommendations.</li> <li>• Ability to analyze and update prints.</li> <li>• Knowledge of craft, manufacturer, equipment and system terminology.</li> <li>• Knowledge of other crafts' work practices and duties.</li> <li>• Knowledge of documentation policies and procedures.</li> <li>• Ability to input relevant and accurate data into manual and electronic system.</li> <li>• Knowledge of the impact of documentation procedures on critical operations and timelines.</li> <li>• Ability to troubleshoot challenging situations and identify solutions to problems.</li> <li>• Knowledge of features and characteristics of an orderly worksite.</li> <li>• Ability to coordinate calibration and certification of tools.</li> <li>• Ability to plan for and organize relevant materials and tools prior to job site work.</li> <li>• Ability to anticipate new tools required to perform necessary work and improve efficiency and safety.</li> <li>• Knowledge of testing procedures, testing parameters, and how to interpret, apply and document test results to validate installation.</li> </ul>	<ul style="list-style-type: none"> <li>• Utilizes previous training and experience to predict outcomes; visually analyzes relationship between parts/whole and process/procedure and interprets charts and graphs.</li> <li>• Leads by example, motivates others to extend their capabilities, develops minority/majority views and persuades others to reverse negative attitudes and behaviors.</li> <li>• Suggests system modifications/improvements and determines system components to be improved.</li> <li>• Understands operation/interaction; manipulates technology for desired results and analyzes technology output.</li> <li>• Understands the requirements of the task and technological results and analyzes task/technology relationship.</li> <li>• Works to improve team skills, encourages team members, assumes responsibility for accomplishing team goals, understands strengths/limitations and resolves conflicts.</li> <li>• Identifies relevant details, facts, specifications, follows set of instructions and qualifies/analyzes information.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><i>E2</i> <i>Supervise maintenance of electrical equipment and facilities</i></p>	<ul style="list-style-type: none"> <li>• Equipment outages are requested and/or scheduled in accordance with OB2.</li> <li>• Work orders, history briefs are completed in BES in a timely manner and maintenance reports are properly reviewed and filed.</li> <li>• Hazardous materials procedures are followed with respect to handling and disposal.</li> <li>• Safety procedures are followed and proper personal protective equipment is provided and worn or used.</li> <li>• Preventive maintenance procedures are followed in accordance with PLGs (performance level guides).</li> <li>• Maintenance is properly documented.</li> <li>• Scheduled maintenance (RCM (Reliability Centered Maintenance)) is performed correctly and completed within 90 days of the due date or variances in schedule are justified and documented.</li> <li>• Diagnostic tests are accurately analyzed and results are reported to appropriate personnel in a timely manner.</li> <li>• Worksite is kept in an orderly condition.</li> <li>• Following maintenance, equipment is tested to ensure proper function.</li> <li>• Plan of action is consistently updated to accommodate required adjustments and direction is provided to direct reports effectively and in a timely manner.</li> </ul>	<ul style="list-style-type: none"> <li>• Knowledge of pumps, seals, packing, and alignments.</li> <li>• Knowledge of auxiliary equipment such as bridge cranes and mobile equipment.</li> <li>• Ability to read and interpret manufacturer's specifications and recommendations and PLGs.</li> <li>• Knowledge of oil filtration, hydraulic and pneumatic systems.</li> <li>• Knowledge of hazardous materials and safety procedures.</li> <li>• Knowledge of preventive maintenance requirements.</li> <li>• Knowledge of relevant agency policies and procedures such as maintenance, testing, documentation and safety.</li> <li>• Ability to input relevant and accurate data into manual and electronic system.</li> <li>• Understanding of how documentation and procedures affect critical operations and timelines.</li> <li>• Ability to report findings and make recommendations based on documented history and findings.</li> <li>• Understanding of the operational system and how equipment maintenance issues can adversely impact operations.</li> <li>• Knowledge of correct equipment, facilities and maintenance terminology.</li> <li>• Knowledge of testing procedures, testing parameters and how to interpret, apply and document test results to ensure equipment is ready for return to service.</li> <li>• Knowledge of features and characteristics of an orderly worksite.</li> <li>• Ability to monitor maintenance project task progress and provide direction to direct reports.</li> </ul>	<ul style="list-style-type: none"> <li>• Analyzes possible causes of problems, generates and evaluates solutions and devises and implements plan of action.</li> <li>• Uses logic to draw conclusions, analyzes rules and principles and examines information for relevance and accuracy.</li> <li>• Monitors system performance, analyzes system operation, distinguishes trends in performance and diagnoses performance deviations.</li> <li>• Utilizes integrated software, utilizes networks and manipulates information.</li> <li>• Suggests system modifications/improvements and determines system components to be improved.</li> <li>• Understands operation/interaction; manipulates technology for desired results and analyzes technology output.</li> <li>• Works to improve team skills, encourages team members, assumes responsibility for accomplishing team goals, understands strengths/limitations and resolves conflicts.</li> <li>• Establishes rapport with co-workers and customers; modifies behavior to environment; shows understanding for others and encourages cooperation and negotiation.</li> <li>• Analyzes implications of decisions, responsibly challenges unethical practices and decisions and formulates ethical course of action.</li> </ul>

<b>KEY ACTIVITY</b>	<b>Performance Indicators</b> How do we know when the task is performed well?	<b>Technical Knowledge</b> Skills, Abilities, Tools	<b>Employability Skills</b> SCANS Skills and Foundational Abilities
<p><b>E3</b> <i>Supervise repair of electrical equipment and facilities</i></p>	<ul style="list-style-type: none"> <li>• Prints and manufacturer's performance specifications are consulted as necessary</li> <li>• Information about the nature and possible causes of failure is systematically gathered through visual inspection, past experience, operator feedback, and observation of equipment during operations and disassembly of equipment.</li> <li>• Proper troubleshooting and diagnostic tests are performed to determine the nature of the problem.</li> <li>• Procedures for isolating problems are initiated correctly and followed through completely.</li> <li>• Safety regulations are followed.</li> <li>• Repaired parts are checked to ensure they meet specifications.</li> <li>• If a part is not available, measures are taken to obtain it in a timely manner and Spare Parts is informed of the lack of availability.</li> <li>• Calibration, certification, and proper maintenance of tools are ensured.</li> <li>• All required tools, equipment and materials for the job are available and in a safe and proper working order.</li> <li>• Recommendations for acquisition of new tools are made to appropriate personnel.</li> <li>• Following repair, equipment is tested to ensure proper function.</li> <li>• Repairs are properly documented.</li> <li>• Worksite is kept in an orderly condition.</li> <li>• Departments, managers, crafts, crews, manufacturers, customers and other appropriate individuals are kept informed of repair progress, problems and completion.</li> <li>• Plan of action is consistently updated to accommodate required adjustments and direction is provided to direct reports effectively and in a timely manner.</li> </ul>	<ul style="list-style-type: none"> <li>• Ability to read prints and to understand manufacturer's specifications and manuals.</li> <li>• Knowledge of the system and equipment.</li> <li>• Ability to perform diagnostic tests, use test equipment and interpret the output from the tests.</li> <li>• Knowledge of basic troubleshooting processes and procedures.</li> <li>• Ability to access and read equipment logs and histories.</li> <li>• Knowledge of multiple crafts and their functional boundaries and nomenclature.</li> <li>• Knowledge of safety equipment and, safe work practices, policies and procedures and the ability to identify unsafe conditions.</li> <li>• Knowledge of equipment inspection procedures.</li> <li>• Ability to identify the root cause and possible adverse effects of malfunction and to properly test and validate successful repair.</li> <li>• Knowledge of proper disposal and refurbishing procedures for parts and repairs.</li> <li>• Knowledge of hazardous material rules and regulations.</li> <li>• Knowledge of proper cleaning and storage procedures for parts and tools.</li> <li>• Ability to perform inspection of tools and materials (restock, recycle or repair).</li> <li>• Ability to anticipate and communicate expertise and staffing needs prior to and during the repair job.</li> <li>• Ability to interact with internal and external customers, other departments or manufacturers.</li> <li>• Ability to input relevant and accurate data into manual and electronic system.</li> <li>• Knowledge of the impact of documentation procedures on critical operations and timelines.</li> <li>• Knowledge of features and characteristics of an orderly worksite.</li> <li>• Knowledge of manufacturer, equipment and system terminology.</li> <li>• Ability to monitor repair project task progress and provide direction to direct reports.</li> </ul>	<ul style="list-style-type: none"> <li>• Troubleshoots and corrects malfunctions and failures; evaluates performance of technology; analyzes failures.</li> <li>• Demonstrates creative thinking process while problem solving; develops creative solutions and applies them to new situations.</li> <li>• Analyzes possible causes of problems, generates and evaluates solutions and devises and implements plan of action.</li> <li>• Selects data relevant to the task, predicts outcomes, analyzes data and integrates multiple items of data.</li> <li>• Summarizes, integrates and analyzes information.</li> <li>• Effectively manages time; prepares and organizes multiple schedules and manages timelines and recommends timeline adjustments.</li> <li>• Monitors system performance, analyzes system operation, distinguishes trends in performance and diagnoses performance deviations.</li> <li>• Conducts task-specific training, coaches others to apply related concepts, provides constructive feedback and develops appropriate training procedures.</li> </ul>