

Qualified Electrical Workers – Utility

Courses to meet OSHA 1910.269 Standard

Online Training

✓ Required * May Be Required Depending on Worker Tasks	Generation	Transmission	Distribution	Lineworker
NFPA 70E (Arc Flash) 2021	✓	✓	✓	
Introduction to OSHA 101-70	✓	✓	✓	
Portable Power and Hand Tool Safety 102-03	✓	✓	✓	
Lockout/Tagout 105-01	✓	✓	✓	
Electrical Safety 107-01	✓	✓	✓	
Energized Electrical Equipment Safety 107-02	✓	✓	✓	
Arc Flash Hazard Basics 107-03	✓	✓	✓	
General Concepts and Job Briefings 140-01	✓	✓	✓	
Enclosed Spaces 140-04	✓	✓	✓	
Electrical Clearances 140-09	✓	✓	✓	
Industrial Math: Measurements and Calculations 170-02	*	*	*	
Industrial Math: Fractions, Percentages, and Ratios 170-03	*	*	*	
AC Induction Motors 409-01	✓			
Transformer Design and Components 415-02	✓	✓	✓	
Transformer Connections 415-03	✓	✓	✓	
Medium and High Voltage Switchgear 417-03	✓	✓	✓	
General Switchgear Maintenance 417-04	✓	✓	✓	
Breaker Specific Maintenance 417-05	✓	✓	✓	
Electrical Faults and Current Ratings 418-01	✓	✓	✓	
Overcurrent Protection, Fuses, and Breakers 418-02	✓	✓	✓	
Wire and Cable Management 421-01	✓	✓	✓	
Making Connections in a Junction Box 421-03	✓	✓	✓	
Medium Voltage Splices and Terminations 423-02	✓	✓	✓	
Fuses and Circuit Breakers 560-03	✓			

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Protective Relays and Instrument Transformers 560-04	✓			
Multimeter 605-01	✓	✓	✓	
Introduction to Engineering Drawings 611-01	✓	✓	✓	
Electrical Drawings 611-03	✓	✓	✓	
Communications Facilities	*	*	*	✓
Excavations	*	*	*	✓
Grounding	*	*	*	✓
Hand and Portable Power Tools	*	*	*	✓
Hazardous Energy Control Procedures	*	*	*	✓
Ladders, Platforms, Step Bolts, and Manhole Steps	*	*	*	✓
Line-Clearance Tree Trimming	*	*	*	✓
Medical Services and First Aid	*	*	*	✓
Overhead Lines	*	*	*	✓
Overhead Lines with Live-Line Bare-Hand Work	*	*	*	✓
Personal Protective Equipment	*	*	*	✓
Power Generation	*	*	*	✓
Special Conditions and Material Handling	*	*	*	✓
Substations	*	*	*	✓
Testing and Test Facilities	*	*	*	✓
Underground Electrical Installations	*	*	*	✓
Vault and Pole-Top Rescue	*	*	*	✓
Working On or Near Exposed Energized Parts	*	*	*	✓

Electrical Theory

These courses provide a foundation for workers who do not have an electrical background.

Electron Theory	401-01
Magnetism and Electromagnetism Explained	401-02
Ohm's and Kirchoff's Laws Relating to DC Circuits	401-03
Evaluating Series and Parallel DC Circuit Performance	401-04
Determine Circuit Outputs from Specified Inputs	401-05
Introduction to Alternating Current (AC)	402-01
Ohm's and Kirchoff's Laws Involving AC Circuits	402-02
Fundamentals of Three-Phase AC	402-07
Transformer Basics	415-01

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