Electrical Craft Helper (Class Code 3799)

Task List

Installation

- 1. Assists in the installation of electrical equipment, power, lighting, and control circuits in water works installations and structures.
- 2. Assists in installing conduit cable, cable boxes, switchers, starters, motors, transformers, circuit breakers, relays, panel boards, lighting fixtures, outlets, bearings, and fuses.
- 3. Drills holes in wood, metal, and concrete for installation of fixtures, conduits, switch boxes, and related equipment.

Testing

- 4. Assists in taking readings of instruments such as ammeters, voltmeters, and meggers in order to ensure that they are working properly.
- 5. Assists in testing and ringing out circuits in order to establish phasing and continuity.
- 6. Assists a journey level worker by performing minor electrical trouble shooting and load checks in order to prevent injury and complete job.
- 7. Tests for gases or gas leaks using electric gas indicator.

Inspection-Maintenance-Overhaul-Repair-Replacement

- 9. Assists in the inspection, maintenance, and repair of electrical facilities and equipment, such as electric power transmission and distribution lines in order to maintain reliable service.
- 10. Makes minor maintenance repairs to lighting fixtures.
- 11. Inspects lighting fixtures, frames, glass panels, and bulbs for damage and malfunctioning.
- 12. Replaces broken glassware and bulbs, burned out sockets, and broken lamp holders.

- 14. Assists journey level workers in maintaining, repairing, and rebuilding generators, motors, transformers, motor generator sets, governors, condensers, turbines, valves, eductors, pumps, switches, switchboard equipment, circuit breakers, disconnect breakers, contactors, passenger and freight elevators and equipment, communication equipment, public address systems, refrigeration, and air conditioning equipment.
- 15. Oils and lubricates turbines, pumps, motors, switches, and other moving equipment in order to keep them running.
- 17. Assists in changing the oil in transformers and circuit breakers.

Assembly-Disassembly-Reassembly-Cleaning

- 18. Assembles equipment for installation.
- 19. Repaints electrical equipment by removing rust, oil, and grease, cleaning contacts, stripping, applying primers and finish coats of paint and enamel.
- 20. Disassembles and reassembles overhead, underground, and lighting equipment in order to clean parts and cases.
- 22. Following completion of jobs, cleans up the work area by disposing of debris and returning tools and equipment to stockroom.
- 23. Cleans and lubricates motors, generators, compressors, pumps, and controllers.

Other Duties

- 26. Supplies tools and materials as requested by a supervisor/lead person and as required by the progress of a job.
- 27. Loads, unloads, and moves materials, equipment, and tools.
- 28. Helps open and close vaults and maintenance holes.
- 29. Assists in the performance of line work by hoisting tools, equipment, and materials up and down poles, holds ladders, steadying lines being worked on, selecting, arranging, and fitting tools and equipment, preparing soldering equipment, pulling lines and guy wires into position with block and tackle.
- 30. Digs, fills, and tamps pole holes in order to set poles.
- 31. Assists in erecting, framing, setting, and removing poles.

- 32. Drives automotive equipment requiring a valid commercial driver's license in order to fulfill duties applicable to the position.
- 33. Assists journey level workers in rigging or guiding material in order load or unload materials or equipment using an overhead crane or other lifting equipment.
- 34. Restocks truck stock by procuring necessary supplies and equipment from warehouse.
- 35. Operates two-way radio installed on truck to maintain communication with electric trouble dispatchers only if required during an emergency in order to ensure the safety of others.
- 36. Sorts, inspects, disassembles, and reconditions salvageable materials, such as solderless connectors, cross arm braces, carriage, space and machine bolts, and copper and iron nails.
- 37. Assists in measuring, cutting, and splicing cables, and wire as directed to progress job.
- 38. Assists in pulling wires into conduits, cutting, threading, bending, and fitting conduits and wire molding.
- 39. Heats tinning and wiping metals and insulating compounds such as tin, and oxide in order to splice cable.
- 40. Dresses and preps lead sleaves; cuts and tins wiping bells and nipples; cuts, tins, and assembles cable and lugs for overhead pothead; shapes and seals end bell caps.
- 41. Bolts rack irons in place for the use of supporting underground cable and equipment.
- 42. Assists in lifting, bending, holding, and racking cable, wiping grease off cable, and stripping insulating material from cable in order to splice cable.
- 43. Guides cable on and off reels in order to cross cable.
- 44. Rods duct line with rodding sticks or fiberglass rod in order to install duct string.
- 45. Relays signals hand and radio signals in order to communicate.

- 46. Assists journey level worker by pulling service cable from maintenance holes and vaults to service customer's premises.
- 47. Assists journey level worker by cutting copper tubing and attaching fittings such as cupling and tees for 34.5 kv gas cable.
- 48. Places snatch blocks and pulleys on sling and snub sling around poles.
- 49. Operates power hacksaws and grinders and other power equipment to perform such tasks as cutting stock and sharpening tools.
- 50. Assists in rigging for purposes of lifting, moving, tearing down, assembling, overhauling, and repairing of equipment.
- 51. Reads and interprets street maps in order to navigate to work site.
- 52. Provides tools, materials, and/or equipment to workers in maintenance holes or other confined spaces by lowering them on lines or in buckets in order to get them to the worker safely.
- 53. Measures materials such as wires and cables for the use at work sites.

Clerical Duties

- 54. Performs clerical work, such as:
 - A. alphabetizing material for filing
 - B. posting information from time cards
 - C. sorting completed orders
 - D. preparing material requisitions, time and equipment cards, and work progress reports.
- 62. Distributes outage notices to customers for a planned electric outage.

Safety Duties

- 55. Completes safety check forms and notes any condition needing maintenance or repair in order to meet California Highway Patrol requirements and/or to assist in scheduling maintenance.
- 56. Checks fuel, oil, and hydraulic and brake fluid levels, tire pressures, brake operation, windshield wipers, lights, and turn signals in order to ensure that the vehicle is ready for safe operation.

- 57. Adheres to the Standard Operating Procedure for confined space entry by lowering testing instruments (Gas-Tech) into a confined space; obtaining the readings of the levels of explosive, toxic, or asphyxiating gasses; ventilating the area using an electric or gasoline powered blower; setting up air line breathing apparatus; and observing workers inside the confined space for indications of asphyxiation or reaction to toxic fumes.
- 58. Follows safety procedures such as Cal/OSHA, City and Department rules and regulations in order to ensure a safe work environment.
- 59. Applies cardiopulmonary resuscitation or other appropriate first aid when needed for such conditions as shock, falls, abrasions, or cuts.
- 60. Places traffic warning signals, flares, manhole guards, and screens around poles and open substructures in order to redirect motorists and pedestrians.