

WECA Commercial Training Program Work Processes

1 Planning and Initiating Project

Minimum Hours - 650

Maximum Hours - 850

- a Establishing temporary power during construction.
- b Establishing grounding systems - i.e. ground rods, rings, ufer.
- c Can include slab & site work - exterior, surveying, digging, forming, pouring pole bases, transformers, pads and other poured in place concrete for electrical systems, excavation, rock crane work, grouting, racking, trenching, conduit placement, leveling and trench and backfill, pull lines and mandrel of all utility conduits.
- d Setting or pouring concrete vaults, manholes, pull boxes or transformer pads.
- e Material handling and management.
- f Blueprints / Layouts.

2 Planning and Installing Branch Circuits

Minimum Hours - 2,800

Maximum Hours - 3,500

- a All underground and in slab raceways.
- b Raceways under 2" - includes all conduit under 2", cable, boxes, supports above ground (rough-in).
- c Wiring installing - includes branch wire.
- d Splicing/Terminating - installing, terminating all devices - i.e. receptacles and switches.

3 Establishing Power Distribution and Panels within Project

Minimum Hours - 1,100

Maximum Hours - 1,300

- a Raceways 2" and over - includes all conduit, boxes, supports above grade.
- b Service and feeder cables - includes feeder wire.
- c Panel boards over 200 amp, setting and terminating main switchgear, distribution boards, panels.
- d Transformers.
- e Bus duct.

4 Trim, Finish and Hookup

Minimum Hours - 1,200

Maximum Hours - 1,500

- a Installing fixtures, recessed fixture housings and motors.
- b Final connections of power to any motor or resistive load such as HVAC and other specialties.
- c Terminate all lighting poles, wall packs, bollards and other exterior light fixtures.
- d Splicing/Terminating - installing and terminating all devices - i.e. - receptacles and switches and final connection to lighting fixtures inside building.

5 Special Systems - includes all conduit, cable, boxes, supports and devices associated with Special Systems.

Minimum Hours - 1,100

Maximum Hours - 1,700

- a Instrumentation and process control systems.
- b Energy management systems.
- c Intercom-Signal systems.
- d Telephone, data, voice and alarms.
- e Motor control center.
- f Theatre, nurse call, Halon fire suppression and other such specialty systems.
- g Installing and terminating wire for lighting control systems and any other control systems.

6 Start-up, Testing and Troubleshooting Electrical Systems

Minimum Hours - 200

Maximum Hours - 300