

CAREER PROFILES

Industrial Electricians:

Industrial electricians install, maintain, test, troubleshoot, and repair industrial electrical equipment and associated electrical and electronic controls.

Wage/Salary Information:

\$62,400 is the median annual salary found in local job-postings.

\$33.95/hour is the median wage reported locally.

Commonly Listed Skills in Job Postings:

- Detail oriented
- Teamwork
- Manual dexterity
- Analytical
- Time management
- Leadership
- Management
- Work independently
- Self-motivated
- Problem solving
- Forklift driving
- Critical thinking

Job Duties:

Industrial electricians read and interpret drawings, blueprints, schematics, and electrical code specifications to determine layout of industrial electrical equipment installations. Industrial electricians install, examine, replace, or repair electrical wiring, receptacles, switch boxes, conduits, feeders, fibre-optic and coaxial cable assessments, lighting fixtures, and other electrical components. They test electrical and electronic equipment and components for

continuity, current, voltage, and resistance, and maintain, repair, install, and test switchgear, transformers, switchboard meters, regulators, and reactors. Industrial electricians also troubleshoot, maintain, and repair industrial, electrical, and electronic control systems, and other related devices and conduct preventive maintenance programs and keep maintenance records.

Working Conditions:

Shift work is common since industrial electricians often work in pulp and saw mills, smelting and mining, and other large-scale resource operations.

Industrial electricians in the Construction industry work both indoors and outdoors. When working outdoors, workers may be exposed to harsh weather conditions. Workers in other industries work mainly indoors.

The work environment can be noisy and dirty with strong odours. Work is also done in cramped spaces and at heights from ladders and scaffolding, so there is a risk of injury from electrical shock or falls. Workers may experience physical injuries such as muscle strains when working in tight spaces.

Industrial construction projects can require workers to temporarily locate to remote job sites.

Career Pathways:

Upon completion of the apprenticeship program, workers receive their journeyman papers and are certified industrial electricians.

After gaining some experience in the field, some industrial electricians may choose to work as an independent contractor.

Industrial electricians with extensive experience may be promoted to an electrician supervisor position.

Industrial electricians are employed by electrical contractors and maintenance departments of factories, plants, mines, shipyards, and other industrial establishments. Below are potential career pathways for industrial electricians:

- Diesel Electrician - Railway
- Maintenance Electrician - Industrial
- Marine Electrician
- Mill Electrician
- Mine Electrician
- Plant Electrician
- Rig Electrician
- Ships' Electrician
- Shipyard Electrician

Check out more possible career pathways on [WEexplore](#).

Education and Training Pathways:

If you're interested in becoming an industrial electrician, you can begin your apprenticeship or attend a local training/education program.

Apprenticeship Details:

Industrial Electrician

- Certification: Voluntary (not required to practice this profession in Ontario)
- Red Seal: Yes
- Training: 9,000 hours of combined on-the-job and in-class technical training
- In-class training: 840 hours

Individuals interested in pursuing an apprenticeship pathway, should follow these steps:

- 1) Get hired – by an employer/sponsor/union
- 2) Apply online to register as an apprentice at www.ontario.ca/page/start-apprenticeship
- 3) Sign a training agreement with your employer/sponsor and the Employment Ontario apprenticeship office.
- 4) Become a Member of the Ontario College of Trades Apprentices Class at www.collegeoftrades.ca/membership
- 5) Keep a record of the hours you work
- 6) Achieve the competencies listed in your training standard if required in your trade
- 7) Complete all of the training requirements in your trade and you will receive a Certificate of Apprenticeship (CoA).
- 8) Write the Exam for the Certificate of Qualification if required in your trade

If you are currently in high school and would like to begin an apprenticeship, visit oyap.com for more information about the Ontario Youth Apprenticeship Program.

Individuals unsure about whether to pursue an apprenticeship or not, can learn more by visiting www.ontario.ca/page/prepare-apprenticeship

St. Clair College:

Electrical Techniques

Admission Requirements:

- OSSD with the majority of courses at the College (C), University (U), University/College (M), or Open (O) level;
- Grade 11 Math must be (C) or (U) level Math:

Academic Credential: Ontario College Certificate – One Year

Professional Certification: May be granted level 1 in school Electrical Apprenticeship training with approval from the Employer, upon graduation

Attendance: In-person

Full-time or Part-time: Full-time

Program Length: 1 year – 2 semesters

Program Cycle: Intake Fall and Winter

Program Cost: \$4,464.61

OSAP Eligible: Yes

Location: 2000 Talbot Road West, Windsor, ON, N9A 6S4

For more information on this program, please visit:

http://www.stclaircollege.ca/programs/postsec/elec_techniques/

***Disclaimer:** The educational institution reserves the right to change information without notice, and may result in discrepancies between their information and the information presented above. If any errors are found, please report them to info@workforcewindsorsex.com.*