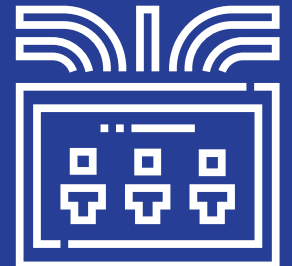# ELECTRICAL TECHNOLOGY

COLLEGE. CREDENTIAL. CAREER.

Electrical Technology is a Hot Job in Michigan

Electrical technologies have a place in many aspects of our lives—from large-scale manufacturing to smaller gadgets that make our lives easier. Electricians do everything from programming the robotics in an automated manufacturing facility to installing wiring in a residential setting. The electrical technology field is great for people who have a knack for technology and who enjoy problem solving. There's always something more to learn as new technologies are developed. There are countless career possibilities, depending on the level of college you want to pursue.

To succeed in this field, electricians must be comfortable using specialized tools and solving problems. They also need to develop knowledge of technical mathematics, electrical circuitry, and safety procedures. You can build on the skills you learn and the training you acquire to specialize in such things as control systems, industrial automation, robotics, embedded controls, medical equipment, avionics, aerospace, and navigational equipment. The possibilities are limitless!

Cool Classes You Can Take

Electricians must learn how to understand whole systems using traditional electrical wiring, but they also need to be ready for the future of the electric industry with some computer programming. There are some cool classes you can choose as you pursue this path, including:

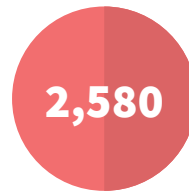### Industrial Automation and Control

Automation and control systems are leading to increased productivity and efficiency across all industries. There has never been a greater need for technicians with the ability to design, troubleshoot, integrate, and maintain electro-mechanical systems. This class utilizes programmable logic controllers to troubleshoot and upgrade existing systems as well as to design new systems.
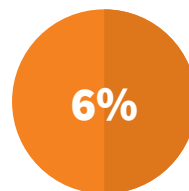
Embedded Controllers

This course prepares students for the future of the electronics industry. Through the use of extensive lab experiments, this course teaches microcontroller programming, which is necessary in making technologies like remote controls, routers, and programmable lighting.

Financial Help

There are many federal grants, work-study funds, and low-interest loans available to help students cover the costs of tuition and fees, room and board, books and supplies, transportation, and other college-related expenses. The first step in securing necessary financial aid is to complete the Free Application for Federal Student Aid (FAFSA).

2,580 — Projected job openings annually

6% — Estimated job growth

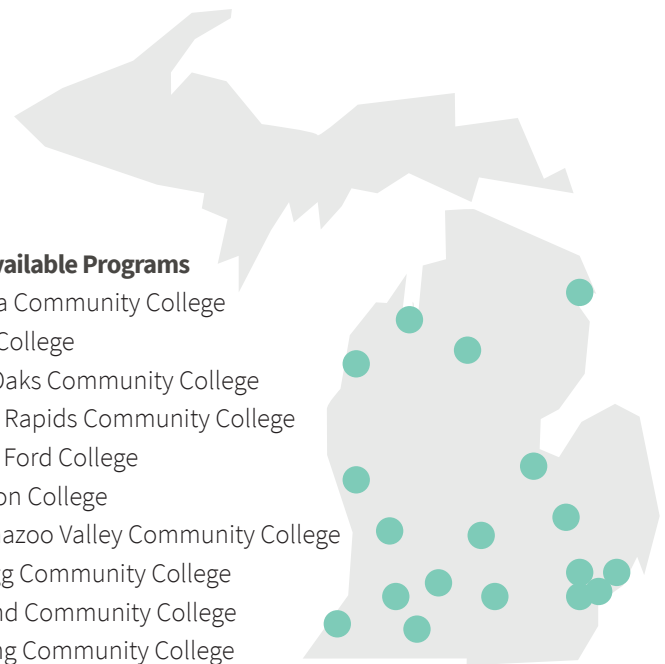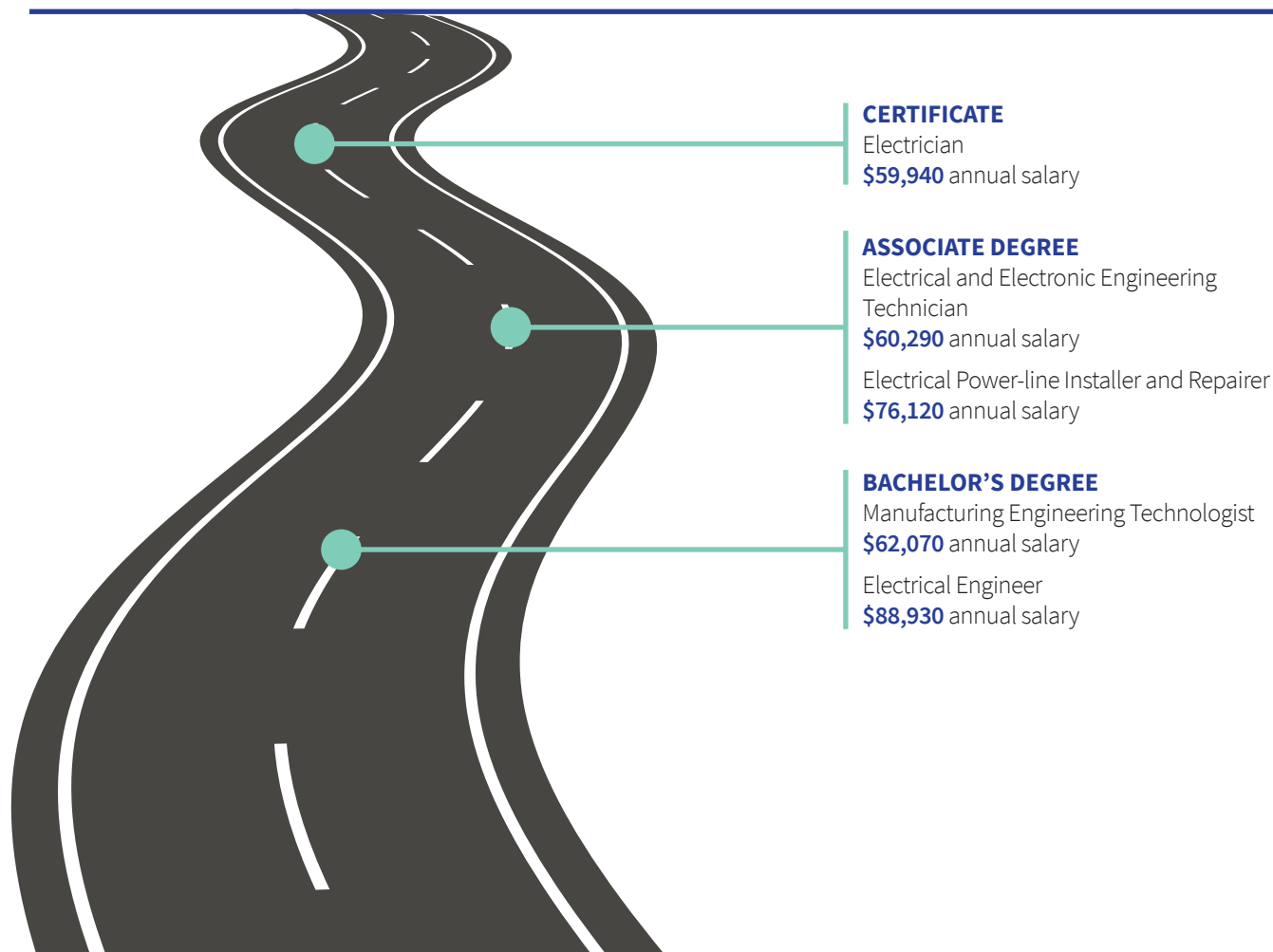**$20–$35** — Hourly rates for electricians

Some Available Programs

- Alpena Community College
- Delta College
- Glen Oaks Community College
- Grand Rapids Community College
- Henry Ford College
- Jackson College
- Kalamazoo Valley Community College
- Kellogg Community College
- Kirtland Community College
- Lansing Community College
- Macomb Community College
- MIAT College of Technology
- Mott Community College
- Muskegon Community Colleg
- Northwestern Michigan College
- Schoolcraft College
- Wayne County Community College District
- West Shore Community College

There are many different education and career paths in **ELECTRICAL TECHNOLOGY**. Here are a few you might follow after graduating from high school.

CERTIFICATE
Electrician
$59,940 annual salary

ASSOCIATE DEGREE
Electrical and Electronic Engineering Technician
$60,290 annual salary

Electrical Power-line Installer and Repairer
$76,120 annual salary

BACHELOR'S DEGREE
Manufacturing Engineering Technologist
$62,070 annual salary

Electrical Engineer
$88,930 annual salary

WHERE
College refers to an educational institution or establishment that provides education beyond high school and/or specialized professional training that is credit bearing.

WHAT
A credential verifies an individual's qualification or competence in a particular area and is usually issued by colleges in the form of certificates and academic degrees.

WHY
A career is a series of jobs that offers opportunities for advancement and provides a path to economic independence.

WHEN
Now! Don't wait to go to college to earn a credential that leads not only to your first job but also to a full and rewarding career!

//MCAN
MICHIGAN COLLEGE ACCESS NETWORK

To learn more about this pathway, check out the video at **roadmap2opportunity.org**.

All occupational information provided by Roadmap to Opportunity is from O*NET Online and is available at onetonline.org.