



Eastern Ontario Secondary School Skills Challenge
@ St. Lawrence College Cornwall

Electrical Wiring Competition
(team of 1)

Time/Location: 8:30 a.m to 4:00 a.m.
Large Gymnasium M160

Purpose of the Contest:

To evaluate competitors' abilities and techniques and to recognize outstanding performances and professionalism in the field of residential electrical wiring.

SKILLS AND KNOWLEDGE TO BE TESTED:

PRACTICAL 95% JOB INTERVIEW 5%

Competitors will be expected to perform competently in all aspects of residential wiring installations with respect to the following:

- ◆ Perform the assigned task from given drawings and specifications.
- ◆ All work must conform to the rules and regulations of the Ontario Electrical Safety Code, 2002, 23rd Edition or the 2006 Canadian Electrical Code, Part 1, 20th Edition.

The assigned task will require a thorough working knowledge in any or all of the following aspects relating to residential electrical wiring:

1. Safety rules and practices in the electrical construction field.
2. Proper use of all tools, materials and equipment that are used in the installation.
3. Basic electrical theory including mathematical calculations, circuitry, schematics, blueprints, and all types of electrical measurements.
4. Installation of service entrance and service equipment.
5. Installation of all types of outlet boxes and related equipment and devices.
6. Trouble shooting of the installation if any problems arise.

Competitors should have a basic knowledge of various wiring types, methods and practices in the residential wiring field.

JUDGING CRITERIA:

- Observing applicable Occupational Health and Safety rules
- Observing the Ontario or Canadian Electrical Code Regulations
- Observing applicable Building Code Regulations
- Interpretation of any written documentation regarding tasks
- Ability to follow plans, drawings and specifications
- Installation Techniques
- Planning and Organization of work
- Choice of economic use of materials and supplies
- Verification of proper operation
- Job Interview

SAFETY:

Safety is a priority at the Ontario Technological Skills Competition. At the discretion of the judges and technical chair any competitor can be removed from the competition site for not having the proper safety equipment and/or acting in an unsafe manner.

1. It is mandatory for all competitors to wear CSA approved eyewear (including side shields for prescription eyewear)*
2. It is mandatory for all competitors to wear CSA approved footwear.*
3. It is mandatory for all competitors to wear CSA approved hard hat.*
4. Jewellery such as rings, bracelets and necklaces or any deemed unsafe by the safety judge shall be removed*

* The safety judge will have final authority on matters of safety.

EQUIPMENT AND MATERIALS:

Listed below are the ONLY TOOLS allowed on the competition site.

Supplied by Competitor:

- tool box and/or tool pouch
- continuity tester and/or multimeter
- ½" wood chisel
- claw hammer
- screw drivers
 - 2 Robertson screw drivers (1 red, 1 green handle)
 - 2 flat screw drivers (small and large)
 - 2 Philips head screw drivers (small and large)
- pliers
 - 1 linesmen pliers
 - 1 diagonal pliers
 - adjustable pliers
 - 1 long-nosed pliers
- wire strippers
- 1 cable stripper

- electrician's knife (disposable blade type not allowed)
- torpedo level
- cordless drill with assorted driver bits
- ½ " to 3/4" wood bits
- allen keys – metric and imperial
- **metric** tape measure or combination (all project dimensions are metric)
- prepared resume (read 'Job Interview' below for further information)
- **personal protective equipment listed in the SAFETY portion of this scope**

Note: 2006 C.E.C. Code Book is permissible and/or the Ontario Electrical Safety Code 2002, 23rd Edition.

Supplied by Committee:

- All required equipment and materials will be supplied with the exception of those items listed above.
- Competitors are only permitted the tools listed above and no others.

CLOTHING REQUIREMENTS:

Competitors are to be dressed in a clean and appropriate manner. Dark blue work shirt and work pants or dark blue coveralls (blue jeans will be acceptable). All clothing must be clean, neat and tidy, with no unsightly stains, patches, rips or tears.

Competitors are not permitted to wear clothing with logos or printing. The exception to this rule is the logo of the school, school board, college, competition sponsor or MTCU District that the competitor is representing. Corporate logos or names are not permitted on a competitors clothing.

JOB INTERVIEW:

To assist competitors in fully preparing for their eventual job searches and to become valued employees, there is a “job interview” incorporated into this contest. It is expected that the competitors will arrive prepared WITH A RÉSUMÉ and be prepared for interview questions and discussion. Competitor’s performance on the interview accounts for 5% of the competitor overall mark.

8:00 to 8:30	Arrival and set up
8:30 to 8:45	Orientation session
8:45 to 3:30	Competition
3:30 to 4:00	Clean up and Judging
4:00	Winners announced

** Job Interviews will be conducted throughout the competition

** Students from the St. Lawrence College carpentry program will be mentoring teams during the competition to provide guidance if needed. Teams receiving assistance will be judged accordingly depending on the amount of support needed.*