



**CONTROLS TECHNICIAN**  
**Operations Services Department**

**Title:** Controls Technician

**Classification:** Trades 2 – NSUPE

**Job Summary:**

The Controls Technician contributes to the effective operation of the Physical Plants within the Halifax Regional Centre for Education and implements the principles of good energy management stewardship. The Controls Technician is responsible for the installation, repair, preventive maintenance and upgrade of energy management systems (EMS) and components including all HVAC components and equipment for buildings owned and operated by the HRCE. The Controls Technician regularly works with and troubleshoots electrical/electronic, pneumatic controls and instrumentation. This position is responsible for monitoring and responding to EMS system alarms and requires mechanical aptitude, physical capability and tradesperson competence. The position reports to the Maintenance Supervisor and takes direction from on duty supervisors.

**Competencies Required:**

The Controls Technician, Operations Department, shall have the following competencies:

- (a) A comprehensive knowledge of building plant systems including heating, ventilation, air conditioning, electrical, plumbing, life safety and controls systems and devices;
- (b) The ability to work, support and communicate effectively within the various sites, Operations Services Department, other Departments of the Halifax Regional Centre for Education, and third parties including students, school staff, parents, and outside entities;
- (c) The ability to employ effective writing skills to communicate with the HRCE and external service providers and to provide written and verbal reports as required;
- (d) Knowledge of Health & Safety procedures, which include fire and emergency plans, and Department of Labour procedures.
- (e) The ability to organize, prioritize and multi-task in the scheduling and completion of work requirements;
- (f) The ability to react effectively to emergencies or other changes to in work environment that require immediate re-prioritizing of tasks;
- (g) The ability to work within a team or individually, as required, with minimal supervision;
- (h) An understanding of and the ability to carry out, policies and procedures developed by the Operations Services Department and the Centre;
- (i) The ability to read and interpret building drawings, schematics, blueprints, code specifications, and diagrams for installation and repair of building systems and equipment;
- (j) Knowledge of applicable regulatory, building and trades guidelines and codes;
- (k) The ability to work with computers and other electronic, digital and analog diagnostic devices such as volt meters, ammeters, multi meters, air flow meters, particulate meters, moisture meters, etc. as programming and troubleshooting tools;
- (l) The desire and ability to engage in continuing education and skills upgrading;
- (m) The ability to understand and promote confidentiality as the norm;
- (n) The ability to apply knowledge, experience and commitment in the areas of race relations, cross cultural understanding, human rights and diversity;

**Qualifications:**

- (a) Grade 12 High School Diploma or equivalent such as a Graduated Equivalent Diploma (GED);
- (b) Diploma or certification of qualification in a building controls trade such as building systems technician, electronics technician, construction electrician, instrument and controls technician or equivalent;
- (c) Relevant technical experience in building maintenance, building automation systems (preferably BACNet) and building automation systems graphics design, pneumatic control, computer programming, communications cabling, and heating, ventilation and air conditioning (HVAC) would be an asset;
- (d) Valid Nova Scotia driver's license and satisfactory driving record;
- (e) Physical and mechanical aptitude to perform a full range of maintenance and manual tasks;
- (f) Inter-provincial red seal in a related field an asset.

## JOB DESCRIPTION...2

### **Specific Job Components:**

The Controls Technician, Operations Department, shall perform tasks as assigned by the Maintenance Supervisor or designate. These tasks may vary, from time to time, with the evolution of the organization and may include, but not be limited by the following:

- (a) Install, maintain, troubleshoot, test, calibrate and repair plant components, some of which include: electronic and pneumatic building controls systems, HVAC systems, data and communication systems and cabling, electrical systems and components, and/or security alarm systems;
- (b) Carry out emergency, planned and preventative maintenance on all assigned equipment within the HRCE as requested. Respond to emergency calls that are a result of mechanical/electrical failure both during and after regular hours of work;
- (c) Investigate indoor environment quality (IEQ) complaints by measuring and analysing IEQ parameters, performing qualitative and/or quantitative inspections of the plant and building accounting for occupant activity;
- (d) Provide verbal, electronic and hard copy reports on HVAC systems performance, maintenance schedules, budget requirements, IEQ investigations etc.;
- (e) Maintain appropriate records including complete equipment repair history, work orders, vehicle records, test reports, maintenance logs and other related data;
- (f) Monitor and control EMS system including reporting on alarms using laptop and/or tablet;
- (g) Ensure that all work is performed to the highest quality workmanship and according to standard practices, meeting national, provincial and local building, electrical, plumbing, heating and other applicable codes;
- (h) Maintain assigned vehicle in an orderly manner and performs daily operational checks;
- (i) Determine and maintain sufficient material inventory, including sourcing correct replacement parts and suppliers, ordering supplies and replacement parts, properly stocking vehicle and regularly recording vehicle inventory;
- (j) Make recommendations and determine quantities and potential work time for proposed upgrades, installations, repairs and projects to assist with proper costing;
- (k) Liaise with other consultants, contractors, inspectors, suppliers, and other departments on maintenance and project work;
- (l) Accurately complete and document work orders prior to submission to supervisor. Provide written reports on any inspections and/or tests and make recommendations to improve performance;
- (m) Maintain clean and orderly conditions in all working areas, including shop, vehicle and school sites;
- (n) Ensure duties are performed in a fiscally responsible manner while observing all safety practices and regulations;
- (o) Perform risk assessment of all projects and maintains risk management protocols at all times;
- (p) Perform other duties as required.

### **Work Environment (Equipment, Demands, and Hazards):**

- (a) Ability and dexterity in the use of various manual and powered hand tools;
- (b) Must be able to use various electrical test equipment such as ammeter, voltmeters, and light meter; IAQ P-Trac, Q-Trac, air flow /velocity meter, decibel meter;
- (c) Work involved with ceiling mounted and moving equipment;
- (d) Occasional periods of high levels of physical exertion are needed. This includes heavy lifting, climbing, crouching, balancing, reaching, stooping, carrying, working in confined spaces, above or below normal temperatures, etc;
- (e) Ability to distinguish full colour spectrum;
- (f) Working at times with very small parts, in areas of public access including office, classroom and mechanical room environments, both individually and with others;
- (g) HRCE identification must be worn and visible at all times during work shift;
- (h) Requires predominately walking and standing and manual labour tasks. Normal work period is spent indoors with occasional outdoor periods;
- (i) Requires use of personal protective equipment appropriate for specific tasks;
- (j) Hours of work and terms of employment subject to Collective Agreement. Work evenings, and weekends as required.