



# Water and Wastewater Technician Program

Darren Demchuk, Chair - WWW

A LEADING POLYTECHNIC COMMITTED TO STUDENT SUCCESS

# WWW Program Overview

- One year certificate
- Three semesters
- Theory on Water and Wastewater Treatment, Water Distribution & Wastewater Collection Systems aligned with ABC Need-to-Know Criteria
- Hands on lab training
- Industry Practicum

# Program Locations

- NAIT Main Campus
  - Four discipline specific labs
  - Simulators, lab testing equipment, and www specific tools.



# WWW Semesters

## WWW Fall Intake

- Semester One (Theory)
  - September to December
- Semester Two (Theory)
  - January to April
- Semester Three  
(Industry Practicum)
  - May to August

## WWW Winter Intake

- Semester One (theory)
  - January to April
- Semester Two  
(Industry Practicum)
  - May to August
- Semester Three (Theory)
  - September to December

# WWW Courses

- **Water Distribution Foundations & Intermediate**
  - Learn about components and operation of water distribution systems including water main repair, valve/hydrant maintenance & repair, water meter installation, etc.



# WWW Courses

- **Water Treatment Foundations & Intermediate**
  - Topics covered include raw water sources, reservoir management, coagulation/flocculation/sedimentation process, disinfection, filtration, taste/odour, softening, etc.
  - Water quality analysis, testing and calibration of equipment in a laboratory setting.



# WWW Courses

- **Wastewater Collection Foundations & Intermediate**
  - Operation and maintenance of collection systems including inspections, confined space awareness, locating of utilities, lift station operation, pump and valve repair, etc.
  - Hydraulics, piping, pumps, compressors, maintenance and troubleshooting of the equipment.



# WWW Courses

- **Wastewater Treatment Foundations & Intermediate**

- Components of the wastewater treatment processes covered including maintenance of screens/racks, grit removal, sedimentation, RBCs, activated sludge, digestion, lagoons, disinfection, filtration, etc.
- Students introduced to wastewater lab equipment, testing and analysis using QA/QC methods.
- Basic automation and control concepts used to control equipment in water and wastewater facilities





# WWW Courses

- **Water and Wastewater Industry Awareness**

- Describe and interpret applicable water and wastewater industry standards and legislation, safety standards and legislation and how these are applied to protect the public and environment.
- Work integration learning concepts and skills will be covered including reviewing professional employment documents tailored to the water and wastewater industry.
- Become proficient in the use of various hand/power tools/equipment used in water and wastewater systems and facilities..

# WWW Courses

- **WWWT 1191 Industry Practicum**
  - Examples of industry practicum employers:
    - EPCOR
    - Town of Edson
    - Strathcona County
    - City of Red Deer
    - City of Spruce Grove
    - Dow Chemical
    - Many more...



# Admission Requirements

- Grade 12 English
- Grade 11 Math
- Grade 11 Science (one)
- Career Investigation not required but recommended

# Post Graduation

- Graduates find employment with:
  - Cities, Towns, Villages, Counties, & Municipal Districts
  - Private Water and Wastewater Maintenance Companies
  - Water and Wastewater suppliers
  - Municipal Engineering Companies

# WWW Program

- Full Time Day program worth 90 continuing education units (CEU) with attendance requirement met through Alberta Environment & Protected Areas

# NAIT Industry Solutions

- **Continuing Education Department**
  - Individual registrations to multiple areas including business, technologies, etc. via classroom, online or a combination
- **Cooperate/International Training Department**
  - Customized training for groups/clients in areas of business leadership, trades and technologies, international and aboriginal initiatives

# WWW Continuing Education

- Theory courses: flexible, self-paced online format, 4 months to complete.
- Recognized by Alberta Environment & Protected Areas for CEUs.
  - Please visit our website [www.nait.ca](http://www.nait.ca) for more information.

# WWW Contact Info.

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- Any other info. refer to [www.nait.ca](http://www.nait.ca)