

JOB CLASSIFICATION DESCRIPTION

ENGINEERING TECHNOLOGIST III

DATE REVISED: October 2021

Job Summary:

Reporting to the Manager of Infrastructure, this is a senior level technical position involving both office and field assignments which are municipal civil engineering. Work involves preparing AutoCAD drawings for capital projects including; roads, drainage, water and sewer utilities, parks, building and traffic facilities, reviewing development design submissions, writing correspondence identifying engineering requirements for approval of proposed developments, inspecting construction of civil works, estimating and coordinating design and servicing works with public utilities, organizations and other agencies, cost control, assisting with budgets, producing design procedures, upgrading specification manuals, asset management or other duties as assigned. This position is expected to oversee the work of other technical staff.

Primary Duties and Responsibilities:

Land Development

- Coordinate production of engineering review comments
- Coordinate review of design submissions (plans, reports and calculations)
- Review and recommend acceptance of as-built drawings
- Inspect development projects
- Conduct design and construction meetings
- Respond to inquiries from the public and developers
- Track development application status and prioritize work
- Prepare letters, memorandums and reports
- Prepare and update engineering standards, specifications and by-law provisions
- Prepare/authorize permits for work within the public right-of-way.

Capital Projects

- Lead the preparation of design plans and specifications for roadway, drainage, water, sewer, parks and other municipal capital improvement projects
- Arrange and conduct pre-construction and jobsite meetings
- Track construction progress
- Review shop drawings and submittals
- Respond to requests for information
- Check tender submittals and progress payments for accuracy and produce required approval documentation for senior staff signature.
- Prepare graphics and display boards for public meetings
- Arrange for surveying, materials testing and final inspections
- Prepare cost estimates for capital projects and grants
- Support resolution of construction conflicts and change orders
- Coordinate scheduling and phasing of projects with public utilities
- Complete advanced field and office survey tasks
- Prepare and coordinate the preparation of AutoCAD drawings
- Maintain project files, plans and reference library

- Maintain infrastructure master plans
- Coordinate capital projects with other departments
- Maintain current core engineering studies
- Complete hydraulic analyses of existing storm, sanitary and water networks
- Identify and prioritize future capital works projects.
- Coordinate development of and perform detailed checking of technical reports, plans, specifications and cost estimates by consulting engineers and architects
- Complete basic traffic engineering tasks.
- Perform other duties as required.

Required Qualifications

Knowledge:

- Thorough knowledge at the technical level of principles and practices of civil engineering applicable to municipal design and construction.
- Thorough knowledge of engineering methods, techniques, materials and equipment used in the design and construction of municipal services and utilities.
- Considerable knowledge of current literature, trends, and development in design and construction.
- Considerable knowledge of asset management, GIS and traffic modeling software preferable.
- Considerable knowledge of the occupational hazards and safety requirements of the work.

Skills/Abilities:

- Communicate effectively both orally and in writing.
- Interpret, report and provide advice and guidance on a variety of regulatory matters as they pertain to City Bylaws and engineering standards.
- Receive and follow work direction; exercise initiative and judgment in carrying out duties with limited supervision.
- Read and interpret engineering codes, standards and drawings.
- Carry out municipal engineering design functions thoroughly and accurately.
- Organize and prioritize work.
- Operate word processing, spreadsheet and related specialty software such as Civil3D, AutoCAD, and hydraulic modeling software.
- Maintain accurate records and prepare routine correspondence.
- Establish and maintain effective working relationships.
- Deal effectively with the public, co-workers and outside agencies.
- Work safely and ensure subordinates are trained and operating in accordance with safe work procedures, including working alone and hazard risk assessments.

Education:

- Diploma in Civil Engineering Technology from an accredited Technical Institute.
- Membership in the Applied Science Technologists and Technicians of British Columbia.
- Possession of a valid B.C. Drivers Licence and good driving record.
- Four (4) years practical related experience in the municipal engineering field

OR an equivalent combination of both training and experience.

Working Conditions

• May involve working alone and will be and will be required to follow the Working Alone Safe Work Procedure - following check-in/check-out practices/procedures.

- May require interaction with residents who may be angry or in an agitated state and demands excellent conflict resolution skills to diffuse high stress situations.
- May be required to occasionally work after hours and weekends to oversee City projects.
- May come into contact with bio-hazardous materials and will be required to follow the exposure control plan and safe work procedures.

The above statement is a general description of the principal functions of this job and is not a detailed description of all job duties.