



MANAGEMENT REPORT

Date: September 9, 2024
To: Mayor and Council
From: Audrey Pascual, Deputy Clerk
Report Number: COU24-102
Attachments: None

Title: Zero Emission Vehicle Infrastructure Program

Objective: To seek approval from Council to apply to the Natural Resources Canada's Zero Emission Vehicle Infrastructure Program to install additional electric vehicle charging stations in the City of Stratford.

Background: In 2022, the City of Stratford was successful in applying for funding to install new EV Charging Stations under the Zero Emission Vehicle Infrastructure Program (ZEVIP) with Natural Resources Canada (NRCan). The City's EV Charging Station Expansion Project has since seen the installation of five new dual port Level 2 charging stations in downtown parking lots. By January 2025, the installation of six additional dual port Level 2 charging stations, along with the City's first Level 3 fast charging station will be completed.

NRCan has announced the launch of the new round of ZEVIP applications. The program will support the deployment of EV Chargers, including Level 3 fast chargers, in public places across Canada with the aim of making EV charging infrastructure accessible for Canadians from coast to coast.

Subject to Council approval, the City is well-positioned to submit a successful application to this program to further expand the City's EV charging network.

Analysis: Under the Zero Emission Vehicle Infrastructure Program (ZEVIP), the City is eligible to apply for the Community Public EV Charging Infrastructure stream. Eligible projects under this stream must increase the number of public EV chargers in the community and must include the installation of a minimum of two Level 3 fast charging stations available for use 24/7 or at least as frequently as the operating hours of the site.

Recognizing that the City's current EV expansion project with NRCAN involves the installation of chargers primarily in the downtown core, staff have identified the Rotary Complex as an alternate location in the community to install Level 3 fast charging stations. While ZEVIP requires a minimum of two Level 3 charging stations to be eligible for funding, staff have collaborated with Festival Hydro to confirm that the capacity of the existing on-site transformer can manage four new Level 3 charging stations. At peak times under current services, staff estimate that 2,000 people attend the Rotary Complex on a weekly basis. With a wide variety of programs and services available at the site and public EV charging infrastructure not being accessible nearby, the City's application for funding would provide an increased service level, potentially draw greater numbers of EV drivers to the area, reduce range anxiety for EV drivers, meet the community's infrastructure needs, and help fill in the gap in the City's as well as the regional EV network especially for fast charging stations.

As noted, eligible programs under ZEVIP require that charging stations must be publicly accessible 24 hours per day, 7 days a week or at least as frequently as the site's operating hours. The Cooper and Downie Parking lots (24-hour parking) were not considered suitable due to the timing of the ongoing discussions for the sites. Even with the preferred remaining location of the Rotary Complex, amendments to overnight parking restrictions are needed to meet conditions imposed by the funder. Therefore, should an application for funding be successful, staff would propose amending the Traffic and Parking By-law to permit overnight parking in the Rotary Complex parking lot for electric vehicle charging. Subject to no concerns from Council, staff would proceed under this intent and report back to Council should the application be successful.

At the time of this report, the cost for a new Level 3 fast charging station is \$62,443.80 (including HST). With four of these stations proposed by staff for the City's ZEVIP application, this would total \$249,775.20 (including HST) in capital equipment costs. From an operating perspective, ongoing annual costs for station support from the service provider would total \$17,121.76 (including HST) for the proposed stations. These services will provide staff with access to important real-time data which displays metrics including usage and availability of stations, both live and historical, identifies when there are issues present with the machine, operational analytics such as energy consumption and related financials.

Currently, exact construction costs for the proposed project to establish power supply and prepare the site for installation are undetermined, as staff are seeking further details. Once this information is available and prior to completing any work, subject to application approval from NRCAN, staff will report back with final project costs for Council approval. Based on costs quoted for the City's current NRCAN expansion project, construction costs for this round of ZEVIP application could be up to \$110,000.

With respect to funding, maximum amounts under the ZEVIP for Level 3 charging stations are up to 50% of total project costs, to a maximum of \$50,000 per charger

based on the proposed stations having an electrical output of 50 kW to 90kW. With the cost per unit at the time of this report and estimated project construction costs, the City could expect to receive a maximum funding amount around \$185,045.08 with a successful application. This would leave approximately \$185,045.08 in project costs for the City's funding contribution from the Parking Reserve Fund, currently projected to have a balance of 2.6 million by the end of 2024.

The City currently has a funding application submitted under the Ministry of Transportation's EV ChargeON Program for the EV expansion project at the Rotary Complex. Under the ChargeON Program, the maximum funding amount for Level 3 charging stations is up to 75% of total project costs, to a maximum of \$75,000 per charger. Both the ChargeON Program and ZEVIP allow for stacking of funds and it is possible to secure up to 75% of the total project cost support from different levels of government (i.e. federal, provincial/territorial and/or municipal). If the City is successful for both applications, the City's contribution of the project reduces to 25%, or \$92,522.54.

One of the mandatory requirements for the ZEVIP application is an attestation that the applicant has secured their share (50%) of the total project costs. Staff are seeking direction from Council to authorize the use of the Parking Reserve Fund for this purpose.

With respect to fees for use of City-owned EV charging stations, all current Level 2 charging stations have been free of charge up to this point. Staff intend to review usage data as more Level 2 stations come online and will consider adding a competitive costing scheme for use of existing or future Level 2 charging stations. For the future Level 3 fast charging station planned for the NRCan expansion project and for the proposed stations under the new ZEVIP stream, staff recognize that these stations come with higher operational and maintenance costs. In addition to the increased kWh per charge, other municipalities implement fees for use of their Level 3 fast charging stations. If the City's application for this program is successful, staff will prepare a fee-for-usage analysis and recommendation for Council's consideration. Prior to implementation of any costing scheme, staff will bring a report forward to Council to recommend amending the City's Fees and Charges By-law with competitive, cost recovery rates for use of the City-owned charging stations, which will then support future maintenance and replacement costs at end-of-life.

Financial Implications:

Financial impact to current year operating budget:

There are no impacts to the current year operating budget as the funding and project would occur in 2025.

Financial impact on future year operating budget:

The impact to the 2025 budget would consist of the capital investment and operating costs of approximately \$238,591.58 (after HST rebates) plus an estimated \$111,936.00

in site preparation costs. Based on the maximum funding available, the net cost to the City would be \$185,045.08. Should the City be successful with its ChargeON application as well, the net cost to the City is \$92,522.54. The final costs along with operating costs that might arise in the first year would be from the Parking Reserve Fund and would become part of the operating budget in 2026, funded from parking revenues.

Link to asset management plan and strategy:

As with all City infrastructure, these assets become part of the City’s asset inventory, requiring periodic maintenance, and replacement at the end of useful life (estimated at 10 years). This future capital cost becomes part of the replacement and funding strategy and would become part of the 10-year forecast at that end of useful life period. This has a financial impact on the parking revenues raised.

Alignment with Strategic Priorities:

Enhance our Infrastructure

This initiative aligns with this strategic priority as its recommendations promote the enhancement of alternative transportation infrastructure and support energy transition to low-carbon sources, through the development of EV Charging networks, which will significantly contribute to emission reductions and support sustainable growth.

Alignment with One Planet Principles:

Culture and Community

Nurturing local identity and heritage, empowering communities, and promoting a culture of sustainable living.

Travel and Transport

Reducing the need to travel, encouraging walking, cycling and low carbon transport.

Staff Recommendation: THAT staff be authorized to apply for funding to install four Level 3 EV Charging Stations under the Natural Resources Canada’s Zero Emission Vehicle Infrastructure Program;

THAT the use of the Parking Reserve Fund be authorized to fund the City’s portion of the project;

AND THAT staff report back with total project costs and amendments required to the Traffic and Parking By-law if required.

Prepared by: Audrey Pascual, Deputy Clerk
Recommended by: Karmen Krueger, CPA, CA, Director of Corporate Services
Joan Thomson, Chief Administrative Officer