



## The Corporation of the Town of Tecumseh

Community Safety

**To:** Mayor and Members of Council

**From:** Wade Bondy, Director Community Safety & Fire Chief

**Date to Council:** February 13, 2024

**Report Number:** CS-2024-02

**Subject:** Fire Equipment Five Year Capital Works Plan 2024-2028

---

### Recommendations

It is recommended:

**That** the 2024 Fire Equipment purchases as summarized in Attachment 1 to Report No. CS-2024-02, Fire Equipment Five Year Capital Works Plan 2024-2028, **be approved;**

**And that** the equipment purchases outlined in report CS-2024-02 **be funded** through the Lifecycle Fire Equipment Reserve.

### Background

The fire equipment capital works plan is intended to maintain equipment in peak operating efficiency, replacing equipment at the end of its useful life, and purchasing additional equipment where necessary to increase safety of firefighters and residents, thus providing improved service to the public.

### Comments

Various types of equipment used by firefighters requires periodic replacement, in accordance with National Fire Protection Association (NFPA) standards for protective gear. Items such as helmets, boots and bunker gear are limited to a ten-year lifespan under these standards.

In addition to replacement of expiring equipment, the funding requested for 2024 includes protective gear for newly hired firefighters. As Council is aware, higher than normal firefighter turnover has occurred in recent past, requiring proper fitting gear to be purchased for incoming firefighters. It should be noted that helmets and boots should not be re-issued to a different firefighter for health and safety reasons.

In addition to the firefighter protective gear, Community Safety is requesting funding for replacement of the SCBA cylinders, the five defibrillators used by the Department and for the purchase of two additional thermal imaging cameras, as noted below.

1. Pagers	\$ 2,400
2. Firefighter Helmets	\$ 4,200
3. Firefighter Boots	\$ 3,000
4. Bunker Gear	\$ 21,000
5. SCBA Cylinders	\$ 140,000
6. Defibrillator replacement	\$ 19,500
7. Thermal Imaging Cameras	\$ 20,000

Council approved replacement of the Department's SCBA in 2020 in order to take advantage of a cooperative purchase with the Region of Waterloo. At that time, the air cylinders had some remaining useful life, and their replacement was deferred. The replacement is now due by the end of 2024. Half of the cylinder stock was planned to be replaced in 2023 however that did not occur due to manufacturing delays. Replacement of the full stock of cylinders is now being recommended.

In late 2023, Essex-Windsor Emergency Medical Services (EW-EMS) switched defibrillator providers to ZOLL Medical Canada across their fleet. This change has two impacts for Community Safety. One being that the two defibrillator systems are no longer compatible. Previously pads already on a patient needed only to be unplugged from one defibrillator and plugged into the other. Now that the systems are incompatible, the pads need to be completely removed and replaced with new pads compatible with the other device. The second impact is that EW-EMS was providing replacement defibrillator pads for those used by fire services on tiered medical calls for service. Going forward, they will only be providing replacement pads for the ZOLL equipment.

In addition to the benefit of consistent and compatible equipment, the ZOLL defibrillators provide real-time feedback to the firefighter performing CPR and instant download capabilities providing accurate information to treating medical staff, that will help to provide better outcomes for patients. To assist with the ongoing training and maintenance costs of the new equipment, the County of Essex has approved an increased Tiered Medical Response grant of \$1,500 per defibrillator for participating fire services starting in 2024, up from \$1,000 per defibrillator. Annual medical training costs

for firefighters is approximately \$6,000 and the remainder of the grant funds are used for medical supply purchases.

In discussions with the Manager Facilities and Energy Management, the existing Community Services defibrillator units can be used to replace older public access units at various Town facilities, as they have been well maintained and have significant useful life remaining.

Community Safety currently has four thermal imaging cameras deployed on apparatus, two of which are approximately fifteen years old. These older cameras were intended to be replaced when the newer cameras were purchased in 2021. The decision was made at the time to have them remain in service on the second dispatched apparatus for as long as they were operational. These two additional cameras added expanded assessment capabilities for fire crews at emergency scenes to determine the source of fires and to perform search and rescue functions with multiple crews simultaneously.

The two older cameras have now stopped functioning properly and Community Safety is requesting funding in the amount of \$20,000 to permanently add the two additional cameras to our equipment inventory. The trial period with the two additional cameras has demonstrated efficiencies and a better service level on-scene that permits faster assessment of the building to detect victims as well as fire extension into walls and enclosed structural areas. The acquisition of the additional two cameras represents an increase in level of service, which is subject to Council approval.

### 2025-2028 Outlook

Looking forward to the years 2025 to 2028, in addition to regular replacement of boots, helmets and bunker gear, Council will note that funding for radio equipment replacement previously requested for 2023, has been delayed until 2025 to match the schedule of the system providers locally. No additional significant purchases are planned for this timeframe.

## **Consultations**

Community & Recreation Services  
Essex-Windsor EMS

## **Financial Implications**

Administration recommends that the aforementioned equipment purchase in the amount of \$210,100 be funded from the Lifecycle Fire Equipment Reserve.

The reserve's annual requirement was adjusted to \$125,000 with respect to increased equipment replacement costs, as referenced in Council Report [CS-2022-01](#). The annual budget allocation to this reserve was increased by \$10,000 during the 2024

budget process, to \$95,000, working towards the annual requirement of \$125,000. The Reserve is expected to drop into a deficit balance for the next three years, after which it will recover. Short-term deficit balances to Lifecycle Reserve accounts are generally covered by the Town's group of Lifecycle Reserves, which overall are in a surplus position.

## Link to Strategic Priorities

Applicable	<a href="#">2023-2026 Strategic Priorities</a>
<input checked="" type="checkbox"/>	Sustainable Growth: Achieve prosperity and a livable community through sustainable growth.
<input checked="" type="checkbox"/>	Community Health and Inclusion: Integrate community health and inclusion into our places and spaces and everything we do.
<input checked="" type="checkbox"/>	Service Experience: Enhance the experience of Team Tecumseh and our citizens through responsive and respectful service.

## Communications

Not applicable

Website

Social Media

News Release

Local Newspaper

This report has been reviewed by Senior Administration as indicated below and recommended for submission by the Chief Administrative Officer.

Prepared by:

Wade Bondy  
Director Community Safety & Fire Chief

Reviewed by:

Tom Kitsos, CPA, CMA, BComm  
Director Financial Services & Chief Financial Officer

Recommended by:

Margaret Misek-Evans, MCIP, RPP  
Chief Administrative Officer

<b>Attachment Number</b>	<b>Attachment Name</b>
1	Fire Equipment Five Year Capital Works Plan 2024 - 2028