

Report to Community and Protective Services Committee

To: Chair and Members
Community and Protective Services Committee

From: Jacqueline Davison, Deputy City Manager Enterprise
Supports

Subject: Single Source Procurement SS 2022-166 Base Station
Replacement for Emergency Communications System

Date: May 31, 2022

Recommendation

That, on the recommendation of the Deputy City Manager Enterprise Supports, with the concurrence of the Director of Emergency Management and Security Services, the following actions be taken, with respect to the single source procurement of two (2) Base Station Replacements for the Emergency Communications System;

- a) the proposal submitted by PSPC Canada Systems Incorporated (formerly L3Harris Canada) for replacement of two (2) of the City's MASTR III base stations BE APPROVED for the purchase price of \$ 1,140,602.00 (HST excluded), in accordance with sections 14.4 d. and 14.4 e. of the Procurement of Goods and Services Policy;
- b) the financing for the proposed lifecycle renewal capital works noted in a) above, BE APPROVED as set out in the Sources of Financing Report attached hereto as Appendix "A".
- c) the approval given herein in a) above, BE CONDITIONAL upon The Corporation of the City of London negotiating satisfactory terms and conditions with PSPC Canada Systems Incorporated (formerly L3Harris Canada) to the satisfaction of the City Solicitor's Office; and entering a formal contract, agreement or having a purchase order relating to the subject matter of the approval set out above
- d) the Civic Administration BE AUTHORIZED to undertake all the administrative acts that are necessary in connection with parts c) above.

Executive Summary

The purpose of this report is to seek Council's approval to permit the Single Source purchase from PSPC Canada to provide supply, installation, and configuration of the upgrade of the base stations at two (2) radio sites; In context of the City's radio system, a base station is used to maintain contact with a dispatch fleet of hand-held (portable) and mobile radios. The current MASTR III base station system was supplied by PSPC Canada Systems Incorporated (formerly L3Harris) (PSPC) to four (4) radio sites in 2016 and will be End of Service (EOS) in 2023. When the MASTR III's are EOS, PSPC will not have the ability to service or replace the hardware should anything malfunction or break. Remaining on unsupported infrastructure increases the risk that the Corporation could lose the main points of connectivity for the mission critical radio system.

Linkage to the Corporate Strategic Plan

This report supports the 2019-2023 Strategic Plan in the following areas:

Building a Sustainable City

- London's infrastructure is built, maintained, and operated to meet the long-term needs of our community

Strengthening Our Community

- Londoners have access to the services and supports that promote well-being, health, and safety in their neighbourhoods and across the city

Analysis

1.0 Background Information

The City of London operates a community wide radio system that is used by emergency and City services to communicate during emergencies and regular operations. The system, commonly known as the “One Voice” system, is a critical communication system for London Police Service, London Fire Department, Environmental and Infrastructure Services and Emergency Management and Security Services.

The City’s radio system is an integrated and proprietary PSPC P25 system, inclusive of both infrastructure and end user gear. The last major upgrade to the system was in 2016, which included the integration of the MASTR III base stations. In 2018, an external consultant completed an audit of the City’s current radio communications system and recommended the City establish a 10-year lifecycle program to ensure continuity of the mission critical infrastructure. In conversations with PSPC Canada, the City’s current MASTR III base stations were declared End of Life (EOL) in 2018 and will be End of Service (EOS) in 2023.

Civic administration forecasted out the future needs of the system based on lifecycle maintenance and coverage issues related to intensification/population growth. It was identified that, to optimise the system and to facilitate identified expansion requirements, the current multicast configuration should be replaced with simulcast configuration.

1.1 Previous Reports Related to this Matter

- Community and Protective Service Committee, November 17, 2015: Radio System Update One Voice 2.0
- Community and Protective Services Committee, November 13, 2018: Emergency Communications Program Update (One Voice)

2.0 Discussion and Considerations

2.1 Base Station Replacement

As part of the system audit completed by CIMA+ in 2018, Civic Administration, in conjunction with PSPC Canada, identified that the City’s existing MASTR III base stations would be EOS in 2023. The replacement base stations support P25 control and working channel operation, maximizing the number of subscriber radios that can be supported on each channel. Additionally, the replacement base stations will support the migration to simulcast, optimizing coverage and capacity for the networks.

2.2 Purchasing Process

Given the proprietary and integrated nature of the radio system, we are requesting single source approval for the replacement of the City’s existing MASTR III base stations, as noted above, in accordance with the Procurement of Goods and Services Policy Sections 14.4 d and 14.4 e.

Single Source means that there is more than one source of supply in the open market, but only one source is recommended due to predetermined and approved specification.

The procurement may be conducted using a Single Source process if the goods and/or services are available from more than one source, but there are valid and sufficient reasons for selecting one supplier, in particular as follows:

- “14.4 d. There is a need for compatibility with goods and/or services previously acquired or the required goods and/or services will be

additional to similar goods and/or services being supplied under an existing contract (i.e. contract extension or renewal);

- 14.4 e. The required goods and/or services are to be supplied by a particular supplier(s) having special knowledge, skills, expertise or experience;”

3.0 Financial Impact/Considerations

The funding to support the Civic Administration recommended proposal from PSPC Canada is available in the life-to-date capital budget of GG1055 One Voice Communications Infrastructure. Please refer to Appendix “A” for the life-to-date capital budget details of this project.

To ensure continuity of the system, it was agreed it would be best to do the upgrade on a site-by-site basis, as once one site was decommissioned, the old MASTR III base stations could be used as spares in the event there was an issue at another site. Simulcast and multicast configurations can work together as a hybrid solution, reducing system downtime and mitigating impacts for any unforeseen issues. Two (2) radio site upgrades have been included in this proposal and one will be brought forward for consideration in 2023. The budget for these activities is currently included in the 2020 to 2023 Multi-Year Budget. The remaining radio sites will be brought forward in through the 2024 to 2027 Multi-Year Budget process.

4.0 Key Issues and Considerations

In order to continue to support critical infrastructure associated with the mission critical P25 radio system, given that PSPC Canada has been a trusted partner of the City for many years and is the only vendor with the required hardware as well as the specialized knowledge of the City’s Emergency Communications system to provide and install the base stations. Changing to a different base station configuration would not integrate with the current radio infrastructure and user gear in use by London Police Services, London Fire Department, Emergency Management and Security Services and Should a different platform be chosen, this would require a significant capital expenditure not included in the approved multi-year Capital Budget, as well as cause operational disruption for our emergency responders.

Conclusion

The replacement of the base stations for the Emergency Communications system will ensure the continued connectivity of the mission critical infrastructure utilized by first responders and City divisions. It is proposed that a single source award to PSPC in accordance with Sections 14.4 d and 14.4 e of the Procurement of Goods and Services Policy to supply and install the replacement two (2) base stations be approved.

Prepared by: Cori Dooling, Manager Emergency Communications System

Submitted by: Dave O’Brien, Director, Emergency Management and Security

Recommended by: Jacqueline Davison, Deputy City Manager, Enterprise Supports