

Kathleen Andrews Garage Project Update

Project Update and Scope Revision

Recommendation

1. That Executive Committee recommend to City Council:

That Capital Profile 12-66-1413 Kathleen Andrews Transit Garage, be amended to update the project scope to reflect changes to the facility programming, as outlined in the February 22, 2018, Integrated Infrastructure Services report CR_5420.

2. That Administration provide a report in second Quarter 2018 outlining potential further budget and schedule amendments to Capital Profile 12-66-1413 to accommodate the electric bus fleet.

Executive Summary

New information pertaining to the programming space within the Kathleen Andrews Transit Garage has resulted in the recommendation that the previously proposed daycare, credit union and administration offices be removed from the scope of work. In addition, the provision of electric buses will result in potential further impacts to the budget, schedule and scope of the project and will be the subject of a separate report to Executive Committee in Q2 2018.

Report

The Kathleen Andrews Garage (previously known as the Northeast Transit Garage or NETG), located at Fort Road and Yellowhead Trail, currently has an expected completion date of March 2019. The new facility has a total of 778,000 square feet of developed space and will replace the aging Westwood Garage, located north of the Northern Alberta Institute of Technology at 106 Street and 118 Avenue. In 2014, the program for the transit garage was approved and included administration staff accommodations for more than 150 workers, 170 maintenance staff and operations workers, parking and storage for approximately 300 diesel buses, 29 maintenance bays, a parts/tire storage warehouse, three undercarriage wash bays, and three refuelling bays with exterior wash bays. Amenity spaces were also planned for the facility, including a commercial daycare, a relocation of the credit union currently leasing space at Westwood Garage, and a staff lunch space.

The initial phase of the work involved a considerable amount of site reclamation due to the presence of buried debris from the former meat packing plant and small landfill area in the south portion of the site. The building is approximately 50 percent complete and the site area and servicing is approximately 20 percent complete.

Removals from the Scope of Work

Since the project's inception in 2013, four key components have emerged, impacting the scope of this project. These include:

- the need for Edmonton Transit Service (ETS) administrative staff space has changed due to the relocation of staff into the Edmonton Tower
- Further review of a plan to relocate a financial institution from Westwood Garage to a the new garage has determined a misalignment with ETS business requirements and would be contrary to industry security practices for a major bus operations facility
- the concept of a daycare was introduced but there was lack of interest from potential third party providers
- decisions to purchase 40 electric buses will necessitate significant modifications to the building, vehicle circulation area and power systems at the garage

Over the course of the past 12 months there has been further evaluation of the program for the transit garage, resulting in a re-defined scope of work for the project. A number of program elements approved in 2014 are proposed to be removed including the commercial daycare, credit union, and a large component of the ETS administrative staff space.

With the opening of Edmonton Tower, a significant portion of ETS administrative staff is now located in the new office space and previously assigned space at Kathleen Andrews Garage is available for alternate use.

A Request for Information (RFI) process was carried out in late 2016 to assess the market interest and qualifications for operating a daycare as part of the Kathleen Andrews Garage. The RFI aligned with the criteria established through the Employer Child Care Policy, however, the RFI only received one application from an unqualified bidder. A second RFI was issued on July 18, 2017 with two proponents expressing an interest in operating a daycare within the facility; however both proponents raised concerns about the suitability, security and safety of this type of service in an active transit garage. The lack of interest from third-party daycare providers has shifted Administration to consider alternative uses for this space in the facility.

The existing Westwood Garage currently contains a credit union with a lease agreement that is set to end in Q4 2019.

When examining the Kathleen Andrews Garage project scope and intended use of space for public services, such as a daycare and financial institution, a review was conducted by Edmonton Transit Service's Safety & Security section in consultation with Corporate Security, Risk Management, Transport Canada and other jurisdictions to assess potential vulnerabilities and threats associated to the proposed occupancies.

Vulnerability is defined as the susceptibility of the system to a particular type of security hazard or threat. Threats include any action which detract from overall security. Threats may range from low to extreme, such as from vandalism to hostage or terrorist situations. Vulnerabilities can be managed through risk assessments and mitigating actions.

The Kathleen Andrews Garage project plans show the financial institution would have a separate, uncontrolled entrance. Nonetheless, any incidents at the financial institution could expose other occupants of the facility to unintended safety risks. Transit service could also be significantly disrupted during such an event.

Industry best practices, along with information provided by Transport Canada, suggests minimizing vulnerability risks by keeping transit garages and administrative spaces restricted to those with authorized access. Administration is recommending the removal of this element and is exploring alternative uses for this space.

Potential Further Additions to the Scope of Work

The removal of the daycare space, credit union and administrative offices provides an opportunity for reprogramming of up to 40,000 square feet of space. There are no other confirmed uses for these spaces at this time; however, a unified control centre is being explored and suitability would be determined subject to further review.

Unified Control Centre for LRT Control, Traffic Management and Transit Surface Control

A functional programming study for a Unified Control Centre is in the initial stages of development. This functional program will identify space requirements and operator needs to determine suitability within the Kathleen Andrews Garage. The intent of the Unified Control Centre is to consolidate the LRT Control, Traffic Management and Transit Surface Control Centres and create synergies between similar business units.

Should Kathleen Andrews Garage be a suitable fit for the Unified Control Centre, funding for design and construction would be required. The amended profile cannot

accommodate implementing a unified control facility; therefore, further funding would be required to proceed with design and construction.

Potential Electric Bus Impacts

On June 22, 2016, City Council directed Administration to proceed with the procurement of 40 electric buses as part of the next major bus purchase. It was determined early on that the majority of these buses would be housed at the Kathleen Andrews Garage as the cost to retrofit an existing transit garage would be considerably greater than modifying the design for Kathleen Andrews Garage. However since the electric bus decision was made approximately five months after the project was tendered, additional engineering work will be necessary and changes negotiated will need to be communicated to the contractor. Design changes become more challenging to accommodate while the project is in the construction phase, however, to date a few design modifications have already been undertaken to accommodate this work, namely:

- \$850,000 in upgrades towards structural slab and roof truss modifications to accommodate the added weight of electric buses and charging stations.
- \$350,000 in upgrades to the roof loading to accommodate the future solar photovoltaic (PV) panel installation. Funding to add the PV panels will be requested in the 2019-2022 budget cycle.

Once the final selection of the bus manufacturer is determined, it is expected that additional modifications will need to be undertaken before the garage is completed. The selection of the preferred bus manufacturer is expected to take place by the end of Q1 2018. These modifications could include, but are not limited to:

- charging stations;
- the addition of a second generator;
- addition of cranes to service the buses;
- electrical and IT requirements to accommodate the charging control systems;
- changes to the fire protection design.

Administration continues to refine the design as negotiations for the bus supplier and construction on the facility progresses. The cost implications associated with these features is dependent on the conclusion of electric bus vendor negotiations. Administration will provide Council with a report outlining these costs and schedule implications in Q2 2018.

Changes to the scope of work to accommodate some initial components associated with the electric bus fleet have been accommodated within the project budget contingency. Once details on the balance of changes required are identified,

Administration will present a budget and schedule adjustment for Council’s consideration.

Budget/Financial Implications:

Once an accurate estimate of the additional electric bus modifications has been determined, a budget and schedule adjustment to this profile will likely be necessary. Administration will outline the budget impacts and a funding strategy in a subsequent report.

Legal Implications:

The new Canadian Free Trade Agreement and Comprehensive Economic and Trade Agreement require that procuring entities must avoid modifying an awarded contract in a manner that could circumvent trade agreements obligations.

In the situation described in this report, to advance the proposed scope changes, careful consideration of procurement options, including contract amendments and/or new procurement, will be made in accordance with the City’s competitive procurement objectives.

Public Engagement

Public open house and project information updates on this project have taken place in conjunction with the Fort Road Business Association annual meetings. The Edmonton Arts Council presented the Percent for Art (Policy C458C) selections to the public for feedback opportunities via a survey.

Corporate Outcomes and Performance Management

Corporate Outcome(s): The City of Edmonton has sustainable and accessible infrastructure			
The City of Edmonton has sustainable and accessible infrastructure	Edmontonians’ Assessment: Access to Amenities and Services that Improve Quality of Life (percent of survey respondents who agree/strongly agree)	67% (2016)	70% (2018)

Risk Assessment

Risk Element	Risk Description	Likelihood	Impact	Risk Score	Current Mitigations	Potential Future Mitigations
Financial	Finalizing the programming for the facility is critical for completing the project; delays could risk increased costs for facility construction,	4 Likely	4 Severe	16 High	Administration is reviewing options for the use of available space	Tenant improvements to fit up are being assessed.

	ability to deliver on time and the ability for operations to utilize for the intended use.				at the facility.	
Project Management	This the first transit garage in North America that is fit out with electric buses, and the volume of electric buses within the facility is large. Unknown requirements may come up as the equipment is being installed.	3 Possible	3 Major	9 Medium	Thorough reviews with the bus vendor, once selected, to review requirements of the equipment installation.	Involve the contractor in the solution to get constructability advice.
Project Management	Power may not be sufficient on site to accommodate a unified control center	3 Possible	3 Major	9 Medium	A feasibility study will be completed to determine the power requirements for a unified control centre and compare against available power on site.	Further programming options will be explored if the control centre cannot be accommodated in the facility.
Project Management	Electric buses within a garage space which is typically hosed down with fire hoses.	3 Possible	2 Moderate	6 Low	Charging stations will have to be waterproof to ensure they are not damaged in the cleaning of the bus garage. This could impact the cost of this equipment.	Find economic ways to waterproof the equipment and look at an operational approach to minimize impacts.

Attachments

1. [Capital Profile Report 12-66-1413](#)

Others Reviewing this Report

- T. Burge, Chief Financial Officer and Deputy City Manager, Financial and Corporate Services
- C. Campbell, Deputy City Manager, Communications and Engagement