



## STAFF REPORT ACTION REQUIRED

### Procurement Authorization Amendment – Purchase 97 Forty Foot Low Floor Clean Diesel City Buses

<b>Date:</b>	May 31, 2016
<b>To:</b>	TTC Board
<b>From:</b>	Chief Executive Officer

#### Summary

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This report recommends that the TTC Board approve a procurement authorization amendment to procure an additional 97 new forty-foot low-floor clean diesel city buses to be delivered in 2017.

The TTC is currently in a contract with Nova Bus, a Division of Volvo Group Canada Inc. (Nova), for the supply of 213 forty-foot diesel buses during the period of 2015 to 2016. This amendment would allow TTC to exercise an option under that contract.

#### Recommendations

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It is recommended that the Board:

Authorize the amendment to Contract C32PM13774 (Supply of Forty Foot Low Floor Clean Diesel City Buses) with Nova in the amount of \$65,203,067.68, as follows:

1. \$58,010,227.68 inclusive of all applicable taxes for the purchase of 97 additional 40 foot buses for delivery in 2017, which includes options, alternatives, and changes already incorporated into the previous bus deliveries.
2. \$6,643,830.00 inclusive of all applicable taxes as an upset limit change allowance for potential contract amendments, escalation costs, special tools and maintenance spare parts pertaining to the 97 additional buses to be delivered in 2017 out of which;
  - i. \$3,255,000.00 has been included in the above upset limit amount as an allowance for escalation costs applicable for the 2017 bus deliveries. The escalation adjustment will be calculated in accordance with the formula set out in the contract which is based on the percent change in the Bus and

Truck Body Producer Price Index 1413 (as established by the United States Department of Labour).

3. \$286,000.00 inclusive of all applicable taxes as an upset limit change allowance to purchase the remaining contract spares and manuals pertaining to the 105 buses delivered in 2015.
4. \$263,010.00 inclusive of all applicable taxes as an upset limit change allowance to cover the costs associated with the installation of the external annunciation system on 78 of the 108 buses to be delivered in 2016. TTC will retrofit the external annunciation system on the 30 buses already delivered to TTC.
5. Establish a delivery schedule with Nova to allow for the delivery of 97 buses in 2017 as detailed in Appendix A. Late deliveries compared to the agreed schedule will be subject to the assessment of liquidated damages by TTC.

## **Financial Summary**

Sufficient funds for exercising the option to Nova Bus are included in the TTC's 2016-2025 Capital Budget and Plan as approved by City of Toronto Council on February 17, 2016 under 4.11 Purchase of Buses as noted on pages 661 and 667-668.

The Chief Financial & Administration Officer has reviewed this report and agrees with the financial impact information.

## **Accessibility/Equity Matters**

All buses to be procured are fully accessible and compliant with all Federal and Provincial regulations.

## **Decision History**

A competitive bid process took place in 2013 for the supply of 55 buses for delivery in 2015 for which proposals were received from Nova and New Flyer Industries Canada (New Flyer). As a result of this competitive bid process, a contract was awarded to Nova on April 30, 2014 for the 55 buses which also included optional pricing for additional buses for delivery in 2016, 2017 and 2018 to be exercised at the TTC's sole discretion.

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2014/April\\_30/Reports/40ft\\_Low\\_Floor\\_Clean\\_Diesel\\_Buses.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2014/April_30/Reports/40ft_Low_Floor_Clean_Diesel_Buses.pdf)

At the Board Meeting of August 19, 2014, TTC staff submitted a report with recommendations to improve transit service in Toronto. These recommendations were supported by the Board.

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2014/August\\_19/Supplementary\\_Reports/Opportunities\\_to\\_Improve\\_Transit\\_Service\\_in\\_Toronto.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2014/August_19/Supplementary_Reports/Opportunities_to_Improve_Transit_Service_in_Toronto.pdf)

As part of the Mayor's initiative to commence improvements to transit in 2015, it was determined that fifty (50) buses would be required in addition to the previously approved fifty five (55) buses scheduled for delivery in 2015.

On February 2, 2015 as part of the 2015 Capital and Operating budget deliberations, City Council approved \$95 million in transit service enhancements beginning in 2015.

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2015/February\\_2/Reports/2015\\_TTC\\_AND\\_WHEEL\\_TRANS\\_OPERATING\\_BUDGETS.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2015/February_2/Reports/2015_TTC_AND_WHEEL_TRANS_OPERATING_BUDGETS.pdf)

A procurement authorization amendment report was approved at the February 25, 2015 Board meeting to exercise the option for the supply of an additional 50 buses for delivery in 2015 and early 2016 to improve bus express routes as identified in the August 19, 2014 Board Report.

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2015/February\\_25/Supplementary\\_Reports/Procurement\\_Authorization\\_Amen\\_dment\\_Purchase\\_50\\_Buses.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2015/February_25/Supplementary_Reports/Procurement_Authorization_Amen_dment_Purchase_50_Buses.pdf)

A procurement authorization amendment report was approved at the July 29, 2015 Board meeting to exercise the option for the supply of an additional 108 buses for delivery in 2015 and early 2016 for ridership growth, service reliability and to increase the bus fleet spare ratio from 12% to 18%.

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2015/July\\_29/Reports/Purchase-108\\_Fourty\\_Foot\\_Low\\_Floor%20Clean\\_Diesel-Buses.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2015/July_29/Reports/Purchase-108_Fourty_Foot_Low_Floor%20Clean_Diesel-Buses.pdf)

A presentation entitled: 2016-2025 Bus Fleet and Facility Plan was received by the Board on October 28, 2015. The Board received the presentation for information, and approved several motions which will be the subject of a future board report.

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2015/October\\_28/Reports/2016-2025\\_Bus\\_Fleet-Facility\\_Plan.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2015/October_28/Reports/2016-2025_Bus_Fleet-Facility_Plan.pdf)

The table below summarizes the decision history and approvals to date by the Board for this Contract:

Date of Approval by the Board	Description	Authorized to Nova	Upset Limit Allowance	Total Authorization by the Board
April 30, 2014	55 Buses (2015 delivery)	\$32,638,072	\$660,000	\$33,298,072
February 25, 2015	Contract Amendment 1 - 50 Buses (2015 delivery)	\$29,670,975	\$340,000	\$30,010,975
July 29, 2015	Contract Amendment 2 - 108 Buses (2016 delivery)	\$63,447,995	\$3,768,000	\$67,215,995
Design Changes, Alternatives, and Options – as offered by Nova in original proposal (credits 2015 base bus price not deducted from allowance)		(\$1,066,970)		
<b>Total to Date</b>		<b>\$124,690,072</b>	<b>\$4,768,000</b>	<b>\$129,458,072</b>
April 27, 2016	97 Buses (2017 delivery)	\$58,010,228	\$6,643,830	\$64,654,058
	Increase to allowance - 2015 delivery spares and manuals (pricing provided with original proposal)	-	\$286,000	\$286,000
	Increase to allowance – 2016 delivery – route annunciation system for 78 buses	-	\$263,010	\$263,010
	<b>Total Current Amendment</b>	<b>\$58,010,228</b>	<b>\$7,192,840</b>	<b>\$65,203,068</b>
<b>Total including Current Amendment</b>		<b>\$182,700,300</b>	<b>\$11,960,840</b>	<b>\$194,661,140</b>

Contract amendments issued to Nova include costs associated with design changes and spares. These amendments have been drawn from the upset limit allowances previously approved by the Board for the 2015 (55 + 50 Bus Order) and 2016 (108 Bus Order) deliveries.

Based on the contract amendments issued to date, there are insufficient funds remaining to cover the following:

- As a result of the changes to the (55 + 50) bus order (air dryer, street side wheelhouse, seat layout, passenger counting system, etc.) there were insufficient funds to purchase the remaining spares and manuals associated with the (55 + 50) bus order.
- For the 2016 order, the External Route Announcement System was a new legislative requirement that was not budgeted at the time of Board approval.

30 of the 108 buses will be paid through Capital Program 4.13 (AODA) and installed by the TTC. The remaining 78 buses will have the system included at the time of delivery by Nova.

## Issue Background

A total of 97 buses are required to be purchased in 2017 as summarized in the following table:

<b>End of Year</b>	<b>2017</b>
<b>Peak Service</b>	<b>1688</b>
- 2016 Peak Service	1644
- Growth or construction mitigation	44
<b>Operating Maintenance Spares</b>	<b>304</b>
- 18% of peak service	304
<b>Capital Spares (Rebuild/Warranty/Retrofit/Programs)</b>	<b>87</b>
- Rebuild Programs	39
- Computer Aided Dispatch, Automatic Vehicle Locator (CAD AVL)	21
- Warranty/Retrofit	27
<b>Total Bus Requirement</b>	<b>2079</b>

<b>2017 Total Bus Requirements</b>	<b>2079</b>
Less: 2016 Total Bus Requirements	2042
Add: Total Buses Scheduled For Retirement (50 – Flyer, Low Floor Diesel, 10 – Orion VII, Low Floor Hybrid)	60
<b>Total Buses Required to Purchase in 2017</b>	<b>97</b>

As noted in the 2016-2025 Bus Fleet and Facility Plan received by the Board on October 28, 2015, the projected 2017 ridership growth was developed through statistical and economic analysis of GDP and employment forecasts, implementation of service level enhancements, changes to fares, etc. Although ridership has been lower than forecast in late 2015 and early 2016 it would be imprudent to assume that this trend will continue and make no provision for the possibility of a return to growing ridership.

If ridership levels do, in fact, not increase in 2017 as budgeted, the additional buses purchased for ridership growth can be easily utilized in a variety of different manners. A variety of construction projects, such as Eglinton Line 5, Finch LRT etc. may begin to have larger effects and additional buses will be required to mitigate service delays on impacted routes. Buses very close to the end of their useful life, and therefore among our

most unreliable, could be retired slightly early to improve customer service reliability. As a final mitigation the quantity of buses planned for purchase in 2018 could be adjusted accordingly.

As part of the full 2017 budget submission an updated fleet plan will be brought to the TTC Budget Committee and the Board defining final use of any new bus purchases.

In summary, despite the possibility of slightly slower ridership growth, it is recommended that the Board approve the purchase of 97 additional forty foot buses for delivery in 2017 as outlined in Appendix A.

## **Comments**

The contract awarded to Nova in 2014, included optional pricing for purchase of buses in 2016, 2017, and 2018, to be exercised at the TTC's discretion. Nova offered firm pricing for each of the optional years subject to an escalation adjustment. The escalation adjustment is calculated in accordance with a formula set out in the contract which is based on the percent change in the Bus and Truck Body Producer Price Index 1413 (as established by the United States Department of Labour) to allow escalation to the bus base price in the option years. For 2016, the bus base price increased by approximately 3.6% from the start of the contract in 2014 as a result of the escalation factor and an allowance of 5.5% has been estimated for the 2017 bus purchase.

At the request of the proponents in 2014, the above escalation adjustment was included as part of the terms and conditions in the contract. The proponents did not request a provision to allow for foreign exchange adjustments, nor was it included in the contract. This has resulted in significant cost avoidance to the TTC as a result of the decline in the Canadian dollar.

On February 25, 2016, Nova confirmed that they could supply 97 buses in 2017 to support TTC's needs and provided a proposed Bus Delivery Schedule attached as Appendix A.

There will be one remaining option year (2018) in this contract.

At the October 28, 2015 Board meeting, a presentation entitled: 2016-2025 Bus Fleet and Facility Plan was received by the Board. The following motion was approved by the Board; "That staff be requested to review and make recommendations to improve the procurement process". An update is provided as follows:

- For the existing bus procurement contract there were two bidders in 2014. To encourage increased competition for the next bus supply contract, the TTC issued a Request for Expressions of Interest (REOI) to bus manufacturers in the world market identified by UITP (International Association of Public Transport) and APTA (American Public Transportation Association) to solicit interest in building buses for the TTC.

- TTC staff are also in the process of working with Metrolinx staff to compare bus specifications from both a commercial and technical standpoint.

The results of these investigations will be the subject of a future Board report to be presented at the Board meeting in June.

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## **Attachments**

Appendix A: Delivery Schedule

**APPENDIX A – DELIVERY SCHEDULE**

<b>Bus</b>	<b>Quantity</b>	<b>Delivery by</b>
Additional 97 Buses		
Bus 213 – 215	3	July 8, 2017
Bus 216 – 223	8	July 15, 2017
Bus 224 – 232	9	August 12, 2017
Bus 233 – 241	9	August 19, 2017
Bus 242 – 250	9	August 26, 2017
Bus 251 – 259	9	September 9, 2017
Bus 260 – 267	8	September 16, 2017
Bus 268 – 272	5	September 23, 2017
Bus 273 – 279	7	October 7, 2017
Bus 280 – 287	8	October 14, 2017
Bus 288 – 292	5	October 21, 2017
Bus 293 – 301	9	November 11, 2017
Bus 302 – 307	6	November 18, 2017
Bus 308 – 309	2	November 25, 2017