



Financial Update for the Period Ended October 5, 2019 and Major Projects Update

Date: December 12, 2019
To: TTC Board
From: Chief Financial Officer

Summary

This report sets out operating and capital financial results for TTC Conventional and Wheel-Trans services for the nine-month period ended October 5, 2019. Year-end projections are also provided.

2019 Operating Results

Description (\$Millions)	Year-To-Date (9 Months)			Year-End Projection		
	Actual	Budget	Variance	Projection	Budget	Variance
TTC Conventional						
Gross Expenditures	1,430.9	1,454.4	(23.5)	1,887.6	1,910.5	(22.9)
Revenue	945.3	962.4	(17.1)	1,267.4	1,288.6	(21.2)
TTC Operating Subsidy	485.6	492.0	(6.4)	620.2	621.9	(1.7)
Wheel-Trans						
Gross Expenditures	115.1	113.4	1.7	151.7	149.1	2.6
Revenue	6.9	6.2	0.7	9.0	8.1	0.9
WT Operating Subsidy	108.2	107.2	1.0	142.7	141.0	1.7

2019 Capital Results

Description (\$ Millions)	2019 Budget	Year-to-Date Actuals		Year-End Projection	
		\$	%	\$	%
TTC Base Capital	1,654.8	819.0	49.5%	1,367.9	82.7%
TTC Transit Expansion	690.9	112.1	16.2%	149.3	21.6%
Total	2,345.7	931.1	39.7%	1,517.2	64.7%

Financial Summary

2019 Operating Results

To the end of Period 9, total TTC Conventional surplus was \$6.4 million offset by \$1.0 million over-expenditure for Wheel-Trans service. Based on current trends, the combined (TTC Conventional and Wheel-Trans) anticipated operating variance is zero (i.e. on budget). This is comprised of a \$1.7 million projected year-end surplus for the TTC conventional service, offset by a \$1.7 million net over-expenditure on Wheel-Trans service. These projected results are inclusive of the \$24 million undetermined corporate reduction which was included in the 2019 operating budget and a projection to draw \$19.7 million of the budgeted \$22.7 million in reserve draws.

2019 Capital Results

At the end of Period 9, total base capital expenditures were \$819 million, representing 49.5% of the 2019 Approved Capital Budget. Total transit expansion expenditures were \$112.1 million with 16.2% of the 2019 Approved Capital Budget being spent. Total TTC base capital expenditures by year end are projected at \$1.37 billion or 82.7% of the 2019 Approved Capital Budget to be spent.

In addition to base capital requirements, it is expected that the TTC will also incur \$149 million in expenditures by year end for transit expansion initiatives reflecting 21.6% of the 2019 Approved funding being spent for these projects. The low spending rate for the transit expansion projects are due to the change in project responsibility and delivery to the Province as of September 1, 2019. TTC staff have halted all work on the Line 2 East Extension, Relief Line South and Yonge Subway Extension projects.

Any unspent 2019 base capital funding, which is currently projected to be \$286.9 million, will be carried forward into 2020 to complete capital work, in accordance with the City's carry forward policy. The carry forward of unspent funds for expansion initiatives will be determined through discussions with the City and Metrolinx.

Equity/Accessibility Matters

The TTC is strongly committed to making Toronto's transit system barrier-free and accessible to all. We believe all customers should enjoy the freedom, independence and flexibility to travel anywhere on the public transit system.

Expenditures required to meet the TTC's accessibility and equity requirements have been provided for in these budgets, including operating funding for elevator maintenance and the continued implementation of Wheel-Trans' Family of Services. Capital funding for the TTC's Easier Access Program is on track to make all subway stations accessible by 2025 with elevators, wide fare-gates and automatic sliding doors.

Decision History

At its meeting on January 24, 2019, the TTC Board approved the 2019-2028 TTC Capital Budget and Plan of \$6.453 billion in funding with \$1.490 billion in 2019 cash flow.

[http://www.ttc.ca/About the TTC/Commission reports and information/Commission meetings/2019/January 24/Reports/10 CIP 2019 2028 Capital Budget Decision.pdf](http://www.ttc.ca/About%20the%20TTC/Commission%20reports%20and%20information/Commission%20meetings/2019/January%2024/Reports/10%20CIP%202019%202028%20Capital%20Budget%20Decision.pdf)

At its meeting on January 24, 2019, the TTC Board approved the 2019 Operating Budgets of \$1,910.5 million gross and \$621.9 million net for TTC Conventional Service and \$149.1 million gross and \$141 million net for Wheel Trans Service and a 2019 total year-end workforce complement of 15,951 positions.

[http://www.ttc.ca/About the TTC/Commission reports and information/Commission meetings/2019/January 24/Reports/11 2019 TTC Wheel Trans Operating Budget Decision.pdf](http://www.ttc.ca/About%20the%20TTC/Commission%20reports%20and%20information/Commission%20meetings/2019/January%2024/Reports/11%202019%20TTC%20Wheel%20Trans%20Operating%20Budget%20Decision.pdf)

At its meeting on March 7, 2019, City Council approved the 2019 Operating Budgets and 2019 – 2028 Capital Budget and Plan.

<http://app.toronto.ca/tmmis/viewPublishedReport.do?function=getCouncilMinutesReport&meetingId=15350>

Comments

Key Indicators – Operating Budget

The TTC's net operating results are primarily driven by six key indicators. These indicators impact year to date spending and revenues, as well as provide the basis for estimated year-end spending projections.

The key indicators include TTC and Wheel-Trans passenger counts and average fare, which impact the \$1.196 billion TTC fare revenue budget. Additional key drivers for TTC include the price of fuel and electric power that affect a combined fuel and utilities budget of \$170 million. The final, and most significant, driver on expenses relates to service hours, which impacts labour expenses (\$1.070 billion), non-labour expenses (\$224 million) such as parts and maintenance, as well as fuel and utility consumption.

The table below details the TTC's key operating indicators:

Item	Year-To-Date Actuals			Year-End Projection			Status
	Actual	Budget	Variance	Projection	Budget	Variance	
TTC Passengers	399.3M	402.1M	(2.8M)	525.3M	526.3M	(1.0M)	✘
TTC Average Fare	2.25	2.26	(0.01)	2.25	2.27	(0.02)	✘
TTC Service Hours	7.395M	7.384M	0.011M	9.494M	9.454M	0.040M	✔
Price of Fuel (\$/litre)	0.957	0.965	(0.008)	0.957	0.971	(0.014)	✔
Price of Electric Power (\$/kWh)	0.146	0.145	0.001	0.148	0.144	0.004	○
WT Passengers	3.13M	3.28M	(0.15M)	4.15M	4.30M	(0.15M)	○

Financial Update – Operating

As detailed in the following tables for the nine month period ended October 5, 2019, the TTC Conventional and Wheel-Trans services reported a combined \$5.4 million surplus and a combined year-end projected net variance of zero. Also provided are tables reflecting comparative information for 2018.

TTC Conventional

2019 Operating Results

Item (\$Millions)	Year-To-Date Actuals			Year-End Projection			Status
	Actual	Budget	Variance	Projection	Budget	Variance	
Expenses							
Departmental Labour	803.1	808.9	(5.8)	1,066.0	1,070.4	(4.4)	✔
Departmental Non-Labour	154.6	162.8	(8.2)	218.4	224.2	(5.8)	✔
Employee Benefits	262.9	264.0	(1.1)	314.1	314.1	0.0	○
Diesel	61.5	66.5	(5.0)	80.2	85.9	(5.7)	✔
Traction Power & Utilities	62.3	62.5	(0.2)	84.1	84.1	0.0	○
Other Corporate Costs	86.5	89.7	(3.2)	124.8	131.8	(7.0)	✔
Total Expenses	1,430.9	1,454.4	(23.5)	1,887.6	1,910.5	(22.9)	✔
Revenues							
Passenger Revenue	896.5	910.0	(13.5)	1,181.4	1,195.8	(14.4)	✘
Other Ancillary Revenue	48.8	52.4	(3.6)	66.3	70.1	(3.8)	✘
Reserve Draws	0.0	0.0	0.0	19.7	22.7	(3.0)	✔
Total Revenue	945.3	962.4	(17.1)	1,267.4	1,288.6	(21.2)	✘
Net (Operating Funding)	485.6	492.0	(6.4)	620.2	621.9	(1.7)	✔

TTC's conventional service is expected to result in a \$1.7 million or 0.3% year-end projected surplus, based on current experience and maintaining the current trend for key indicators. This projected result is inclusive of the \$24 million undetermined corporate reduction, which was approved in the 2019 Operating Budget and the use of all but \$3.0 million from the reserve funding draw also approved in the 2019 Budget process. The key budget variances that account for this projection are as follows:

FAVOURABLE VARIANCES

Diesel Expenditures: \$5.8 million decrease

It is anticipated that diesel expenses will be below budget primarily due to lower consumption rates of the newer bus fleet. This favourable trend has been reflected in the proposed 2020 Operating Budget submission.

Departmental Non-Labour: \$5.7 million decrease

Lower than budgeted vehicle maintenance expenses are expected to occur primarily as a result of improved bus and subway car vehicle reliability, with these expenditure trends reflected in the proposed 2020 Operating Budget submission. One-time underspending is also anticipated on Vision system hardware and software costs due to a later than anticipated implementation on streetcars and maintenance related functions.

Departmental Labour: \$4.4 million decrease

These savings are primarily driven by one-time underspending related to the later than anticipated implementation of 2019 initiatives. This includes the hiring of 70 additional Transit Enforcement personnel and instructors required to support master sign-up training. Lower average wage rates, given unusually high levels of operator hiring also contributed to this underspending.

Leasing Expenditures: \$3 million decrease

One-time reduced leasing expenses are expected as a result of a delay in the occupation date for the new consolidated warehouse.

PRESTO Commissions: \$2.5 million decrease

PRESTO fees are expected to be below budget on a one-time basis, due to the continued sales of legacy fare media in 2019, which resulted in a lower than planned adoption rate.

UNFAVOURABLE VARIANCES

Passenger Revenues: \$14.4 million decrease

It is expected that revenue rides will be one million below budget by year-end and that average fare will continue to trend 1% below budget for the remainder of the year.

2019 revenue and revenue rides have been impacted by:

- Significant inclement weather events experienced in January and February, which were the key contributors to the underachievement of revenue ridership.
- Underachievement of the average fare is primarily due to the trend of period pass users transitioning to e-purse given the benefit provided by the two-hour transfer. This trend has been reflected in the proposed 2020 Operating Budget submission.

Reserve Draws: \$3 million decrease

\$22.7 million in reserve draws was budgeted this year. Based on the projected funding required, \$19.7 million in reserves is projected to be drawn.

All other variances net to a \$2.3 million unfavourable variance, and primarily relate to lower than anticipated recoveries for City construction supplemental service.

Staff will closely monitor both revenues and expenses and take action to mitigate any projected year-end unfavourable variances.

2019 vs 2018 Results Comparison

Item (\$Millions)	Period 9 (Year-To-Date)			Year-End		
	2019 Actuals	2018 Actuals	Change	2019 Projection	2018 Actuals	Change
Expenses						
Departmental Labour	803.1	746.2	56.9	1,066.0	1,018.6	47.4
Departmental Non-Labour	154.6	148.9	5.7	218.4	214.2	4.2
Employee Benefits	262.9	245.5	17.4	314.1	282.0	32.1
Diesel	61.5	56.9	4.6	80.2	75.0	5.2
Traction Power & Utilities	62.3	59.2	3.1	84.1	77.3	6.8
Other Corporate Costs	86.5	62.3	24.2	124.8	142.3	(17.5)
Total Expenses	1,430.9	1,319.0	111.9	1,887.6	1,809.4	78.2
Revenues and Reserve Draws						
Passenger Revenue	896.5	868.8	27.7	1,181.4	1,162.1	19.3
Other Ancillary Revenue	48.8	46.6	2.2	66.3	64.1	2.2
Reserve Draws	0.0	0.0	0.0	19.7	0.0	19.7
Total Revenue	945.3	915.4	29.9	1,267.4	1,226.2	41.2
Net (Operating Funding)	485.6	403.6	82.0	620.2	583.2	37.0

Note: 2019 results include one additional week of results relative to 2018.

Explanation of Year-Over-Year Changes

Expenses are expected to be \$78.2 million (4.3%) higher on a year-over-year basis.

Key drivers of this increase include:

- Collective Bargaining Agreement: \$29 million
- Employee Benefits due to inflation, utilization, and legislative changes related to Canada Pension enhancements and OHIP+ \$23 million
- Net effect of higher PRESTO Commissions \$25 million and offsetting legacy fare media savings (\$5 million), as a result of increasing PRESTO adoption rates: \$20 million
- Full year costs of 2018 Capacity Improvements: \$10.5 million
- Net increase in diesel price and consumption: \$5.0 million

An expected decrease of \$17.5 million year-over-year in Corporate Costs is expected primarily due to one-time reserve contributions and a provision for Eglinton bus supplemental service costs, covering both 2017 and 2018, which was included in the 2018 results.

The net remaining \$9 million increase is comprised of a variety of items including increased fare enforcement costs, service adjustments to maintain standards and general material inflation.

Revenues and Reserve Draws are expected to increase by \$41.2 million (3.4%). The additional revenue is attributable to the April 1 fare increase and the utilization of one-time reserve draws.

Wheel-Trans Results

Item (\$Millions)	Year-To-Date Actuals			Year-End Projection			Status
	Actual	Budget	Variance	Projection	Budget	Variance	
Expenses							
Bus Service	38.9	42.5	(3.6)	52.6	56.9	(4.3)	✓
Contracted Taxi	52.5	44.9	7.6	69.2	59.0	10.2	✗
Employee Benefits	12.7	13.9	(1.2)	15.1	16.5	(1.4)	✓
Administration/Management	11.0	12.1	(1.1)	14.8	16.7	(1.9)	✓
Total Expenses	115.1	113.4	1.7	151.7	149.1	2.6	✗
Passenger Revenues	6.9	6.2	0.7	9.0	8.1	0.9	✓
Net (Operating Subsidy)	108.2	107.2	1.0	142.7	141.0	1.7	✗

To the end of Period 9, the Wheel-Trans service is \$1.0 million or 0.9% above budget and projected to be \$1.7 million or 1.2% above budget by year-end. This projected deficit will be offset by the anticipated surplus for TTC Conventional Service. The key budget variances that account for this projection are as follows:

Contracted Taxi Services: \$10.2 million increase

The increase in costs is attributable to a higher average distance travelled per passenger as longer trips have been assigned to contracted taxis to meet the CBA's requirement to schedule 38% of trips on Wheel Trans buses. This trend has been accounted for in the proposed 2020 Operating Budget submission.

Salaries and Wages: \$3.7 million decrease

Timing of workforce hiring experienced to date primarily account for this variance. Recruitment is underway to fill related vacancies. Adjustments have been reflected in the proposed 2020 Operating Budget submission to reflect vacancy trends and backfill timeframes.

Employee Benefits: \$1.4 million decrease

This underspending is a direct result of lower than anticipated salary and wage expenses.

Customer Service: \$1.7 million decrease

The decrease is primarily due to lower costs for eligibility appeals and lower Family of Services implementation costs.

Passenger Revenues: \$0.9 million increase

The favourable revenue projection is due to an adjusted methodology for the allocation of PRESTO monthly pass revenue between Wheel-Trans and TTC Conventional. This trend has been reflected in the proposed 2020 Operating Budget submission.

Materials and Supplies: \$0.4 million decrease

Lower than budgeted vehicle maintenance expenses primarily as a result of decommissioning of problematic fleet and replacing them with newly procured fleet. This trend has been reflected in the proposed 2020 Operating Budget submission.

All other changes are expected to net to a \$0.4 million favourable variance.

2019 vs 2018 Results Comparison

Item (\$Millions)	Period 9 (Year-To-Date)			Year-End		
	2019 Actuals	2018 Actuals	Change	2019 Projection	2018 Actuals	Change
Expenses						
Bus Service	38.9	37.6	1.3	52.6	51.7	0.9
Contracted Taxi	52.5	44.8	7.7	69.2	61.2	8.0
Employee Benefits	12.7	11.9	0.8	15.1	13.8	1.3
Administration/Management	11.0	9.0	2.0	14.8	13.4	1.4
Total Expenses	115.1	103.3	11.8	151.7	140.1	11.6
Passenger Revenues	6.9	5.7	1.2	9.0	7.4	1.6
Net (Operating Funding)	108.2	97.6	10.6	142.7	132.7	10.0

Note: 2019 results include one additional week of results relative to 2018.

Explanation of Year-Over-Year Changes

Expenses are expected to be \$11.6 million (8.3%) higher on a year-over-year basis. Key sources of this increase include:

- Inflation impact and longer trips on contracted taxis (\$8.0 million)
- Labour and benefit expenses due to additional workforce, including operators and reservationists offset by vacancies. (\$2.0 million)
- Impact of CBA increase (\$1.2 million)
- Increased spending on the Wheel-Trans transformation initiative (\$0.4 million)

Revenues are expected to increase by \$1.6 million (21.6%) compared to 2018. This is attributable to the April 1, 2019 fare increase and the adjusted methodology for the allocation of PRESTO monthly pass revenue between Wheel-Trans and TTC Conventional.

Financial Update – Capital

The TTC had incurred \$819 million in capital spending as of October 5, 2019 reflecting a spend rate of 49.5% for the TTC base capital program and \$112.1 million or 16.2% for transit expansion projects.

By year-end, the TTC is projecting \$1.52 billion in overall capital spending, split between the TTC base capital (\$1.37 billion or 82.7%) and transit expansion (\$149.3 million or 21.6%).

TTC 2019 Capital Results

Description (\$ Millions)	2019 Budget	Year-to-Date Actuals		Year-End Projection	
		\$	%	\$	%
TTC Base Capital					
Infrastructure Projects	869.9	405.6	46.6%	667.2	76.7%
Vehicle Related Projects	784.8	413.5	52.7%	713.8	91.0%
Total - Base Capital	1,654.7	819.0	49.5%	1,381.0	83.5%
TTC Transit Expansion					
Toronto York Spadina Subway Extension	303.8	17.7	5.8%	42.3	13.9%
Scarborough Subway Extension	164.2	63.5	38.7%	73.2	44.6%
Relief Line - Design	219.6	30.5	13.9%	33.3	15.2%
Waterfront Transit - Design	3.3	0.4	12.7%	0.6	16.6%
Total - Transit Expansion	690.9	112.1	16.2%	149.3	21.6%

The TTC's 2019 year-to-date and projected yearend capital results are primarily driven by the Purchase of Streetcars for Vehicle related projects. For Infrastructure Projects, the main drivers are the ATC Resignalling and Other Buildings and Structures projects.

Key Highlights

Vehicle Related Projects

Purchase of Streetcars:

\$182 million or 51% of the \$358 million 2019 Approved Budget has been spent as of Period 9. Projected year-end spend is anticipated to be \$288 million or 81% of the Approved Budget for 2019.

Infrastructure Projects

ATC Resignalling:

\$45.6 million or 62.1% of the \$73.3 million 2019 Approved Budget has been spent as of Period 9. Projected year-end spend is \$62.9 million or 85.6% of the Approved Budget for 2019.

Other Buildings and Structures:

\$48.7 million or 29% of the \$170.4 million 2019 Approved Budget has been spent as of Period 9. Projected year-end spend is \$102.4 million or 68% of the Approved Budget for 2019.

TTC Transit Expansion

As of September 1, 2019, TTC staff halted all work on the Line 2 East Extension, Relief Line South and Yonge Subway Extension projects as a result of provincial legislation, which has transferred the projects' responsibility and delivery to the Province.

Consequently, the projected year-end spend on expansion projects is expected to be \$149.3 million or 21.6% of the \$690.9 million 2019 Approved Budget.

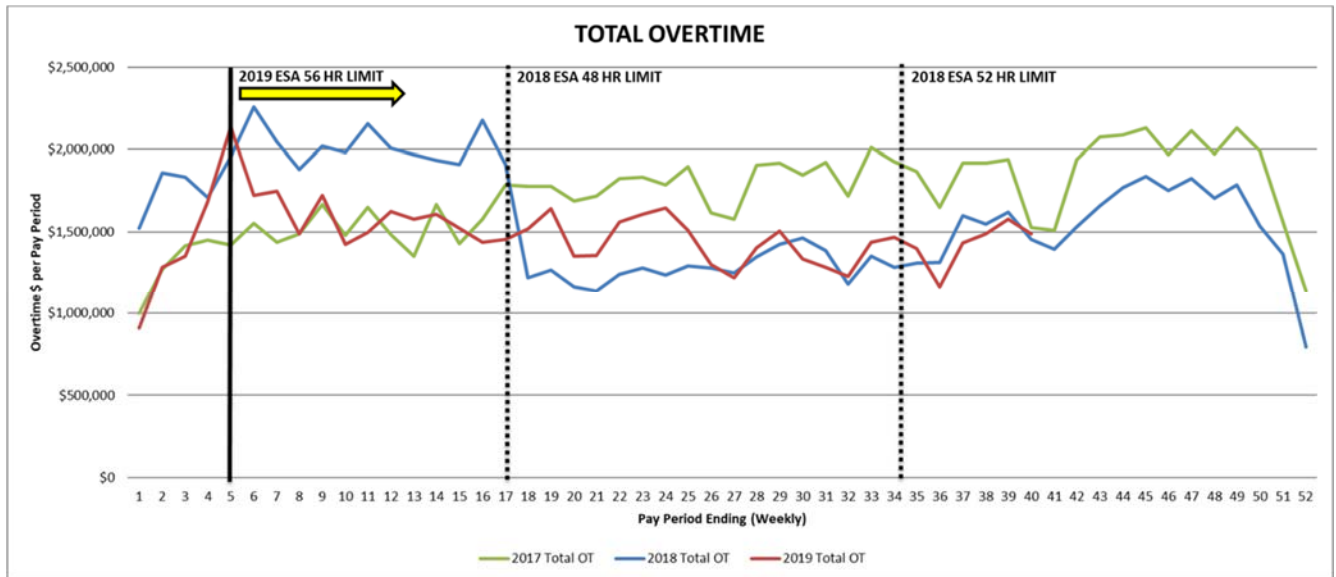
Additional Capital Spending Summaries

Additional information on 2019 capital spending by project is included in ***Appendix 1 – 2019 Capital Spending Summary by Project.***

Information on capital delivery performance for major projects within TTC's base capital and transit expansion programs is also available within ***Appendix 2 - Major Projects Update.***

Overtime

Overtime spending is down 9% year-to-date in 2019, relative to 2018.



Notes:

Includes all budgets: Operating, Wheel-Trans, Capital
 Amounts are not adjusted for annual CBA increases

Analysis

Paid overtime is 9% below 2018 levels on a year-to-date basis, with reduced spending in virtually all departments and employee groups. One exception to the trend is overtime spending in Subway Infrastructure. This exception is due to the full resumption of weekend subway closures in 2019 which were significantly curtailed in 2018.

Excluding Subway Infrastructure, paid overtime is approximately 14% below 2018. The key driver of this decrease is attributable to the additional operator hires in 2018 & 2019, which have helped to ensure that all scheduled service is operated while reducing Operator overtime by \$7 million on an annual basis, from May 2018.

Overtime spending trends are actively monitored by department. Certain overtime to respond to emergencies and complete trackwork during weekend subway closures is unavoidable. Opportunities to shift other work to resources on regular time continues to be actively pursued.

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Attachments

Appendix 1 – 2019 Capital Spending Summary by Project
Appendix 2 - Major Projects Update.

Appendix 1 – 2019 Capital Spending Summary by Program

**Toronto Transit Commission
2019 Capital Budget Variance
For the Period Ended October 5, 2019**

EXPENDITURES BY PROGRAM	2019 Budget	Year-to-Date			Year End		
		Actuals	Variance	%	Projection	Variance	%
TRACK	57.7	35.3	22.4	61%	54.4	3.3	94%
1.1 Subway Track	25.5	17.6	7.9	69%	24.8	0.8	97%
1.2 Surface Track	32.2	17.7	14.4	55%	29.6	2.5	92%
ELECTRICAL SYSTEMS	142.5	88.5	54.0	62%	121.4	21.1	85%
2.1 Traction Power	21.8	18.1	3.7	83%	22.0	(0.2)	101%
2.2 Power Distribution/Electric Systems	9.4	5.9	3.4	63%	9.0	0.3	96%
2.3 Communications	21.3	9.0	12.3	42%	12.6	8.7	59%
2.4 Signal Systems	16.6	9.8	6.8	59%	14.9	1.7	90%
ATC Resignalling	73.5	45.6	27.9	62%	62.9	10.5	86%
BUILDINGS & STRUCTURES	493.9	219.6	274.3	44%	422.1	71.8	85%
3.1 Finishes	19.4	11.1	8.3	57%	19.4	0.0	100%
3.2 Equipment	78.9	15.4	63.5	20%	79.2	(0.3)	100%
3.3 Yards & Roads							
Streetcar Network Upgrades & BRT	1.9	0.7	1.2	38%	2.0	(0.1)	105%
On-Grade Paving Rehabilitation Program	6.2	3.7	2.5	59%	6.2	(0.0)	100%
Bicycle parking at stations	0.9	0.0	0.9	1%	0.4	0.6	40%
Transit Shelters & Loops	0.4	0.0	0.4	6%	0.4	0.0	94%
3.4 Bridges & Tunnels	36.6	24.8	11.8	68%	36.5	0.1	100%
3.9 Buildings and Structures Projects							
Fire Ventilation Upgrade	16.2	6.9	9.3	42%	15.0	1.2	93%
Easier Access Phase III	59.6	38.6	21.0	65%	59.6	(0.0)	100%
Leslie Barns	5.0	1.8	3.3	35%	2.8	2.3	55%
Toronto Rocket/T1 Rail Yard Accommodation	38.3	20.6	17.6	54%	38.3	0.0	100%
McNicoll New Bus Garage	60.0	47.3	12.7	79%	60.0	0.0	100%
Other Buildings and Structures	170.4	48.7	121.8	29%	102.4	68.0	60%
VEHICLES	784.8	413.5	371.4	53%	664.2	120.7	85%
REVENUE VEHICLES							
4.11 Purchase of Buses	303.4	162.0	141.4	53%	260.2	43.1	86%
4.11 Purchase of Buses - Wheel Trans Buses	9.3	6.0	3.3	65%	9.1	0.2	98%
4.12 Purchase of Subway Cars	7.5	1.3	6.2	17%	6.6	0.9	87%
4.13 Bus Overhaul	43.0	32.7	10.3	76%	43.7	(0.7)	102%
4.15 Streetcar Overhaul	4.4	1.1	3.3	24%	1.2	3.2	27%
4.16 Subway Car Overhaul	34.4	22.6	11.8	66%	35.6	(1.2)	103%
4.18 Purchase of Streetcars	357.6	182.4	175.2	51%	287.9	69.7	80%
NON-REVENUE VEHICLES							
4.21 Purchase Automotive Non-Revenue Vehicles	9.3	0.6	8.7	6%	9.3	0.0	100%
4.22 Rail Non-Revenue Vehicle Overhaul	3.8	1.3	2.5	35%	2.1	1.7	55%
4.23 Purchase Rail Non-Revenue Vehicles	12.1	3.6	8.6	29%	8.5	3.6	70%
TOTAL OTHER	175.8	62.1	113.7	35%	105.8	70.0	60%
TOOLING, MACHINERY & EQUIPMENT							
5.1 Shop Equipment	6.4	0.9	5.5	14%	3.7	2.6	59%
5.2 Revenue & Fare Handling Equipment	7.3	0.3	7.0	4%	1.4	5.9	19%
5.3 Other Maintenance Equipment	5.0	1.0	4.0	21%	3.4	1.6	67%
5.4 Fare System	19.3	4.3	15.1	22%	6.0	13.3	31%
ENVIRONMENTAL PROGRAMS							
6.1 Environmental Programs	11.8	6.5	5.2	55%	11.8	(0.0)	100%
6.1 Safety and Reliability	10.0	0.0	10.0	0%	0.0	10.0	0%
COMPUTER EQUIPMENT & SOFTWARE							
7.1 Computer Equipment & Software	89.6	42.2	47.4	47%	66.6	23.0	74%
OTHER							
9.1 Furniture & Office Equipment	0.4	0.1	0.3	29%	0.4	0.0	100%
9.2 Service Planning	26.1	6.8	19.3	26%	12.6	13.5	48%
Total Base Programs	1,654.7	819.0	835.7	49%	1,367.9	286.9	83%
Toronto York Spadina Subway Extension	303.8	17.7	286.1	6%	42.3	261.5	14%
Scarborough Subway Extension	164.2	63.5	100.7	39%	73.2	91.0	45%
Relief Line South - Design	219.6	30.5	189.2	14%	33.3	186.3	15%
Waterfront Transit - Design	3.3	0.4	2.9	13%	0.6	2.8	17%
Total Transit Expansion Projects	690.9	112.1	578.8	16%	149.3	541.6	22%

Appendix 2 – Major Projects Update

Overview:

The TTC's delivery of a multi-billion-dollar capital program is guided by TTC's Project Management Framework. The broad range of capital projects are categorized into four project types, the greater the category the more complex the project (higher risks and uncertainties). The categorization takes into consideration amongst other things - budget, staff experience in delivery, risks and uncertainty behind the project itself. It should be noted that transit expansion projects are classified as Category 4 projects. The programs and projects referred to hereafter as projects, have been included in the dashboard due to their magnitude and/or strategic significance. This quarterly update highlights the performance of these projects against their approved budget, planned schedule and in scope activities.

Dashboard: Capital Spending for Category 3 & 4 Projects

Category 3 Projects Capital Spending Dashboard

Projects/Programs	Critical Path	Cost (millions)						Actual				Projected		Schedule			Scope		
		2019 Year to Date		2019 Approved Budget	2019 Probable	Approved Budget	LTD	CS	CT	EFC	OS	CS	CT	OS	CS	CT	OS	CS	OS
		Budget	Actual																
Category 3																			
Automatic Train Control (ATC) "Line 1"	3	\$53.0	\$45.6	\$73.3	\$62.9	\$660.9	\$483.3	Y	⇒	\$660.9	Y	Y	⇒	Y	G	⇒	G	Y	Y
Easier Access Phase III	4	\$47.3	\$38.6	\$59.6	\$60.9	\$829.6	\$287.6	G	⇒	\$829.6	Y	G	⇒	Y	G	⇒	G	G	Y
Fire Ventilation Upgrade & Second Exits		\$12.3	\$6.9	\$16.2	\$15.0	\$494.6	\$278.1	Y	⇒	\$599.0	Y	G	⇒	G	G	⇒	G	G	G
McNicoll Bus Garage	3	\$46.6	\$47.3	\$60.0	\$60.0	\$181.0	\$106.5	G	⇒	\$181.0	G	G	⇒	G	G	⇒	G	G	G
Toronto Rocket 111 Railcars (subway vehicles)	3	\$29.5	\$20.6	\$38.3	\$42.1	\$495.4	\$274.2	G	⇒	\$495.4	G	Y	⇒	Y	G	⇒	G	G	G
Purchase of Buses	3	\$145.1	\$162.0	\$303.4	\$308.9	\$1,064.5	\$684.8	G	⇒	\$2,867.2	Y	Y	⇒	G	G	⇒	G	Y	Y
Purchases of 204 Light Rail Vehicles	3	\$234.5	\$182.4	\$357.6	\$287.9	\$1,186.5	\$990.7	G	⇒	\$1,186.5	G	Y	⇒	Y	G	⇒	G	Y	Y
Wheels Trans 10-Year Transformation Program	4	\$9.8	\$4.4	\$12.8	\$7.9	\$49.8	\$14.8	Y	⇒	\$49.8	Y	Y	⇒	Y	G	⇒	Y	Y	Y
SAP ERP Implementation	5	\$9.0	\$4.1	\$13.9	\$6.7	\$93.2	\$68.4	Y	⇒	\$163.2	G	Y	⇒	G	G	⇒	G	Y	Y
VISION Program (CAD/AVL)	3	\$18.9	\$21.7	\$37.3	\$27.9	\$117.2	\$63.0	G	⇒	\$117.2	G	Y	⇒	G	G	⇒	G	Y	Y
FARE COLLECTION / PRESTO	3	\$12.7	\$3.7	\$18.8	\$5.1	\$81.8	\$55.1	G	⇒	\$128.8	G	Y	⇒	Y	Y	⇒	Y	Y	Y
Stations Transformation	4	\$12.3	\$4.9	\$17.5	\$9.4	\$50.8	\$13.1	Y	⇒	\$50.8	G	Y	⇒	Y	G	⇒	G	Y	G
Total		\$631.0	\$542.3	\$1,008.7	\$894.7	\$5,305.4													



Performance Scorecard Status
G On Track to meet project objectives
Y At Risk of Not Meeting Project Objectives
R Will Not Meet Project Objectives

Trend Values
 ↑ Performance Improving
 ⇒ No Change
 ↓ Performance Declining

Total Base Capital Program (Category 3)	Cost (\$Millions)			
	2019 Approved Budget	2019 YTD Actual	Approved Budget	Estimated Final Cost
	\$1,008.7M	\$542.3M	\$5,305.4M	\$7,329.4M

Note:

- Financials are reported as of Period 9 including Carry Forward amounts from 2018 and reflect budget approvals as of March 7, 2019. All other Project Performance Indicators (overall status, schedule and scope) and explanations for the same are updated as of Period 9.

AUTOMATIC TRAIN CONTROL (ATC) “LINE 1”

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2015	2022	\$660.9M	\$483.3M	\$660.9M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
Y	Y	\$53.0M	\$45.6M	\$73.3M

Project Description:

Objective: To enable reliability and provide customers with increased on-time service and reduced travel time.

TTC is re-signaling Line 1 (Yonge-University-Spadina) to improve reliability and capacity. ATC provides the benefit of real time central train control with precise train location data. With ATC installation, train speed and separation between trains will be controlled automatically. This allows for reduced travel times and more consistent service.

Re-signaling of Line 1 to introduce ATC includes the design, installation, testing and commissioning of an upgraded Centralized Signaling System as well as the design, installation, testing & commissioning of ATC trainborne equipment in the Toronto Rocket fleet.

Project Update & Accomplishments:

- ATC is in operation (100%) on Line 1 from Vaughan Metropolitan Centre to St. Patrick Station.
- Commissioned five workcars with Automatic Train Protection.
- Completed 75% of Phase 3B (St. Patrick to Queen) testing, high speed train testing is scheduled to begin in November 2019. Phase 3B remains on schedule to be in revenue service by Q1 2020.
- Completed Phase 3C (Queen to Rosedale Station) construction.
- Completed 22% of Phase 4 (Rosedale to Eglinton) construction.

Key Issues/Risks & Mitigation Plan:

Completed the initial quantitative risk assessment currently under review by the Project Management Office and will be finalized by Q4 2019.

- Closure cancellations: cancellations continue to be high risk for successful project completion. Mitigation: Prioritize and plan alternate closure weekends.
- Eglinton Crosstown LRT interface: ECLRT project timeline impacting ATC design and implementation. Mitigation: Coordinate with ECLRT project.
- Asbestos removal program interface: Determination of final ATC equipment location may cause changes to the asbestos removal program. Mitigation: Coordinate with Alstom to ensure equipment survey accuracy. Maintain communication with Asbestos removal team to coordinate timelines.

Forecast Completion Year: In-service 2022

ATC Phases	Construction and Installation of ATC Assets	Testing	In Service Date	Status
Phase 1 (Yorkdale to Dupont)	100%	100%	Q4 2017	Completed
Phase 2 (VMC to Sheppard West)	100%	100%	Q4 2017	Completed
Phase 2B/2C (Wilson Yard Interface)	100%	100%	Q4 2018	Completed
Phase 3A (Dupont to St. Patrick)	100%	100%	Q2 2019	Completed
Phase 3B (St. Patrick to Queen)	100%	75%	Q1 2020	On Schedule
Phase 3C (Queen to Rosedale)	100%	20%	Q4 2020	On Schedule
Phase 4 (Rosedale to Eglinton)	22%	0	Q4 2021	On Schedule
Phase 5 (Eglinton to Finch)	0	0	Q3 2022	On Schedule

Note:

- This project is included under 2.4 Signal Systems as indicated in Appendix 1.

EASIER ACCESS III

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2007	2025	\$829.6M	\$287.6M	\$829.6M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
G	Y	\$43.1M	\$38.6M	\$59.6M

Project Description:

Objective: To make all subway stations accessible and compliant with required legislation.

TTC's Easier Access Program will make all remaining subway stations accessible by providing elevators, wide fare gates, automatic sliding doors and signage improvements. Currently, 45 stations are accessible to people with disabilities. This Program also addresses a Legislated requirement (to have elevators in service at all subway stations).

Note: Scarborough Rapid Transit (SRT) – Line 3 station locations are not part of the program as the SRT line will be replaced by the Line 2 East Extension.

Project Update & Accomplishments:

- Construction for station accessibility is on-going at 11 stations: Dupont, Royal York, Wellesley, Yorkdale, Chester, Runnymede, Wilson, Lansdowne, Bay, Keele and Sherbourne Stations, all remaining stations are in design phase.
- Islington and Warden redevelopments have commenced preliminary design and proceeding towards Stage Gate 2.

Key Issues/Risks & Mitigation Plan:

- **3rd Party Constraints:** other work priorities/schedule do not align with project schedule. Mitigation: Add dedicated resources, planning utility work in advance and identifying and expropriating property needs early.
- **Design complexities: installing elevators in existing stations may present** larger amount of design complexities and construction challenges. Mitigation: Add additional resources and advancing detail designs.

Note:

- This project is included under 3.9 Building and Structures as indicated in Appendix 1.
- In addition to the Estimated Final Cost (EFC) noted, there is an additional \$250M in estimated project costs Post 2028 included through the Capital Investment Plan.

FIRE VENTILATION UPGRADE & SECOND EXITS

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
1998	2028	\$494.6M	\$278.1M	\$599.0
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
G	G	\$17.1M	\$6.9M	\$16.2M

Project Description:

Objective: To improve ventilation in subway tunnels and construct second exits at 14 high priority stations.

Fire Ventilation Upgrade (FVU) is a fire and life safety initiative originating in 1998 to improve ventilation performance in the subway tunnels. The project was expanded in 2003 to include second exits to improve egress at 14 high priority stations.

Project Update & Accomplishments:

- Continuing construction of 'second exit' at Chester Station.
- Design for Museum, Summerhill, and Dundas West stations in progress.

Key Issues/Risks & Mitigation Plan:

- Design complexities for installing second exits present challenges and require design changes. Mitigation: Advance design work and review potential opportunities. Request for additional funding.

Note:

- This project is included under 3.9 Building and Structures as indicated in Appendix 1.
- TTC 2019-2028 Budget included unfunded amount of \$104M. In addition to the EFC noted, there is an additional \$1.5B in estimated project costs Post 2028 included through the Capital Investment Plan.

MCNICOLL BUS GARAGE

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2013	2020	\$181.0M	\$106.5M	\$181.0M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
G	G	\$29.3M	\$47.3M	\$60.0M

Project Description:

Objective: To improve the transit system and meet growing ridership demands.

McNicoll Bus Garage is part of TTC's commitment to improving transit service and meeting growing ridership demands. This new bus garage will be fully compliant with Toronto Green Standards and will be the first major Design-Build project for TTC in over a decade. The new facility is being constructed at Kennedy Road and McNicoll Avenue in Scarborough.

Note: Project scope is for construction only.

Project Update & Accomplishments:

- Design-Build Contract MN1-1 is progressing as follows:
 - Continued progress on mechanical/electrical systems, drywalling, painting, tiling.
 - Masonry, spray fireproofing, and green roof nearing completion.
 - Commenced paving, and installation of bus hoists.
- Project spending has exceeded estimated budget projections for 2019 due to necessary contract changes and payments for delivered equipment awaiting installation. Overall project remains on time and on budget within the prior project approval by the TTC and City of Toronto of \$181M.

Key Issues/Risks & Mitigation Plan:

- The sheet metal workers strike impacted the installation of ductwork and transpired solar wall, and impacted work by other trades. The project team is working with the contractor and stakeholders to minimize the impact on the schedule and maintain the move-in date.

Note:

- This project is included under 3.9 Building and Structures as indicated in Appendix 1.

TORONTO ROCKET/T1 RAIL YARD ACCOMODATION (SUBWAY VEHICLE FACILITIES)

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2010	2025	\$495.4M	\$274.2M	\$495.4M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
G	G	\$26.8M	\$20.6M	\$38.3M

Project Description:

Objective: To increase subway train storage and maintenance capacity.

Design and construction at various subway vehicle maintenance and repair facilities and yards to increase the subway train storage and maintenance capacity for Toronto Rocket (TR) subway trains, including Wilson and Davisville Yards for Line 1, and T1 trains at Greenwood, Keele Yard and Kipling tail tracks for Line 2. Key scope elements include:

- Expansion to the north and south at Wilson Carhouse as well as the installation of new storage tracks within the yard.
- Expansion to north and south at Davisville Carhouse along tracks 3 & 4.
- Conversion of existing CN rail delivery track at Greenwood Yard into a powered and signalled storage track.
- Track and Structural work at Keele Yard to provide additional storage capacity.
- Refurbishment of the box structure within Kipling Station for the installation of a 3rd track to be used for the storage of two subway trains.

Project Update & Accomplishments:

- Contractor for "Wilson Yard Fencing and Miscellaneous Site Services" continues with the installation of direct buried conduits and a cable trough. Fence and gate for separation with ATC areas is complete. Work has commenced for the installation of stairs to the overhead walkway.
- Contractor for Wilson Carhouse Expansion is working on masonry partitions and will commence duct work on the HVAC units placed on the carhouse roof via helicopter lift.
- Greenwood Yard – Finishes and fixtures installation for Track & Structure building continues. The pendent system in the Carhouse is on phase 12 of 12. The pendent system in the Shop is on phase 6 of 9.

Key Issues/Risks & Mitigation Plan:

- None

Note:

- This project is included under 3.9 Building and Structures as indicated in Appendix 1.

PURCHASE OF BUSES

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
Ongoing	2028	\$1,064.5M	\$684.8M	\$2,867.2M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
Y	Y	\$183.4M	\$162M	\$303.4M

Project Description:

Objective: To a) replace old vehicles and grow our fleet to increase overall system capacity and reduce overcrowding; b) utilize vehicles which will be more accessible, more comfortable and more reliable; c) aid the City of Toronto in meeting its TransformTO target of an 80% reduction in greenhouse gas emissions by 2050 by adopting zero emission buses.

This ongoing program covers the procurement of buses according to the Green Bus Technology Plan approved by the Board in June 2018. The 2019 delivery plan includes 260 new buses, including 200 latest generation hybrid-electric buses and 60 zero-emissions battery electric buses (eBus).

The Green Procurement Plan currently projects a mix of hybrid electric and fully electric bus procurements for the years 2021-2024 as we transition to a steady-state procurement of solely fossil fuel free/zero emissions buses in 2025 and a zero-emissions fleet by 2040.

Project Update & Accomplishments:

Hybrid Buses (200):

- 162 of 200 hybrid-electric buses scheduled for delivery in 2019 have been delivered, with 120 buses available for service, and the remainder undergoing commissioning. The remaining bus deliveries for 2019 are on schedule.

eBuses (60):

- 20 of the 60 eBuses have been delivered, with 10 available for service, the rest are currently undergoing commissioning.

Charging System (Garages):

- Arrow: Charging systems has been installed and is functioning to support 20 electric buses. Construction of the back-up generator will be commencing in October.
- Mount Dennis: Charging systems installed and functioning to support 20 electric buses.
- Eglinton: Charging systems has been installed and is functioning to support 10 eBuses.

Key Issues/Risks & Mitigation Plan:

- BYD's delivery schedule has slipped further from October 2019 to December 2019.
- After successful delivery base orders from both Proterra and New Flyer, both manufacturers have reported slips in schedule for their remaining 15 eBuses from Q4 2019 to Q1 2020.

- Delivery by vendors is being proactively managed by ensuring Liquidated Damages in the amount of 50% of the contract value should the buses be delivered after the PTIF deadline.

Note:

- Unfunded Fleet Plan: Procurement of all buses beyond 2019 is on the unfunded list in the amount of \$1.8B. This funding gap has resulted in deferral of the next procurement from 2021 to 2022.
- Large Scale Adoption of eBuses: Due to long lead times, funding for procurements and installation of charging systems must be secured by Q1 2020 to allow for expansion of the eBus fleet in 2022.

PURCHASE OF 204 NEW STREETCARS

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2009	2019	\$1,186.5M	\$990.7M	\$1,186.5M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
Y	Y	\$235.0M	\$182.4M	\$357.6M

Project Description:

Objective: To: a) replace old vehicles and grow our fleet to increase overall system capacity and reduce overcrowding; b) utilize vehicles which will be more accessible, more comfortable and more reliable.

This project provides for the purchase of 204 new fully accessible new streetcars to replace the existing fleet of 196 Canadian Light Rail Vehicles (CLRVs), 52 Articulated Light Rail Vehicles (ALRVs) and additional vehicles for ridership growth and congestion relief efforts.

Project Update & Accomplishments:

- The delivery of remaining new Low Floor Light Rail Vehicles (LFLRV) continues to progress well. As of September 30, 2019, 185 new streetcars were commissioned and 178 were in revenue service. Bombardier is planning to fulfill their order of 204 vehicles by the end of 2019.

Key Issues/Risks & Mitigation Plan:

- Parts and material supply for production and to support operations pose a risk to the delivery schedule and in-service reliability. Supply chain risks and issues continue to be monitored and managed across all suppliers as we approach the end of the delivery.

Note:

- This project is included under 4.18 Purchase of Streetcars.
- The Capital Investment Plan identifies the need for the procurement of up to an additional 100 streetcars for ridership growth, which is currently unfunded.

WHEEL-TRANS 10-YEAR TRANSFORMATION PROGRAM

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2017	2021	\$49.8M	\$14.8M	\$49.8M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
Y	Y	\$9.8M	\$4.4M	\$12.8M

Project Description:

Objective: To support the new service delivery model which integrates Wheel-Trans customers into the conventional network.

TTC Wheel-Trans Transformation Program implements new policies, processes and systems to support a new service delivery model that integrates Wheel-Trans customers into the TTC's conventional network through a 'Family of Services' (FOS) approach.

Project Update & Accomplishments:

- Program is re-baselining, new estimates and baselines are being generated for related projects and program to align with the stagegating process.
- Construction contract awarded for 10 of the Access Hubs sites. Construction is underway 8 sites and pending safety submittals at other 4. Tenders are issued/awarded for another 4 sites.

Key Issues/Risks & Mitigation Plan:

- Continuing to deliver to customer communication to mitigate a potential negative response related to re-registration and conditional trip matching. Legacy customers are voluntarily choosing to re-register indicating that customer communications have been effective.

Note:

- This project is included under 3.9 Building and Structures as indicated in Appendix 1.

SAP ENTERPRISE RESOURCE PLANNING PROJECT

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2015	2023	\$93.2M	\$68.4M	\$163.2M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
Y	Y	\$9.0M	\$4.1M	\$13.9M

Project Description:

Objective: To implement an industry-standard enterprise software solution that modernizes our core systems and aligns with the City of Toronto's SAP Roadmap.

Project Update & Accomplishments:

Phase II implementations are in progress for the People Group and Finance and Treasury Department. Collaboratively developed a joint RFP for a new SAP Vendor of Record for professional services with the City of Toronto to be issued by December 2019. The EFC represents the total SAP program cost with the future phases.

SAP Projects - Phase II

- Initiated Phase II project implementation for the Accounts Payable Release 1 scope.
- Initiated the Job Based Costing System Assessment planning.
- Initiated project implementation for the new SAP Learning Management System.
- Time and Attendance RFP draft is in progress and planned to be issued Q1 2020.
- Employee Mobile Communication App testing completed and ready for soft launch deployment by December 2019.

Key Issues/Risks & Mitigation Plan:

- Procurement: The Time and Attendance RFP is procuring hardware, software and professional services and is complex in nature. The project team has participated in understanding the City's lessons learned on their implementation and is applying those lessons and RFP templates, working the TTC business and IT teams to ensure all terms and conditions comply with purchasing requirements.

Note:

- The EFC represents the total SAP program cost with the future phases.
- This project is included under 7.1 Computer Equipment & Software as indicated in Appendix 1.
- Approved budget and completion year adjusted to reflect approval to end of 10-year envelope.
- The SAP program has been realigned and prioritized, which is reflected in the 2020-2029 budget submission. Approval for funding is required to deliver the program from 2020-2029.

VISION (CAD/AVL)

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2016	2020	\$117.2M	\$63.0M	\$117.2M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
Y	Y	\$18.9M	\$21.7M	\$37.3M

Project Description:

Objective: Implement VISION (Vehicle Information System and Integrated Operations Network) to a) modernize the backbone of how the TTC tracks, manages and communicates with any one of our 2,000 buses and streetcars on the streets at any moment; b) provide better information for scheduling and planning; c) provide better real-time information to provide operators and customers during their trip; d) provide more efficient Transit Signal Priority to keep TTC vehicles moving; and e) provide more efficient yard management and crew sign-ups.

This modernization initiative was initiated to transform the way in which the TTC manages its surface fleet of buses and streetcars. The core component of the program is the implementation of a new Computer Aided Dispatch/Automatic Vehicle Location (CAD/AVL) System which is being installed on the TTC's bus and streetcar fleets. The system provides for: data and voice communications, automatic vehicle location; automated stop display, stop announcements, vehicle performance monitoring; integration with the onboard camera and automatic passenger counting systems; tools and automation of selected business rules. In addition, the program will implement an integrated Yard Management System at all streetcar car-houses and bus garages.

Project Update & Accomplishments:

- Commenced installing of VISION for 204 Low Floor Light Rail Vehicles (LFLRV) targeting Q4 2020 completion.

Key Issues/Risks & Mitigation Plan:

- Commenced installation of VISION on LFLRV: VISION installation on LFLRVs. The vendor supply of materials and issues encountered during testing pose risks to the installation schedule. Working with vendor to expedite issue resolution.
- Yard Management: The installation of the Yard Management System used to track the location of the vehicles in garages and streetcar car-houses is in progress. Completion of exterior installations at garages and car-houses is dependent on the award of infrastructure contract (Nov 25, 2019). Reviewing risk mitigation strategy of engaging multiple infrastructure vendors to allow for earlier completions.

Note: This project is included under 7.1 Computer Equipment & Software as indicated in Appendix 1.

FARE COLLECTION / PRESTO

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2012	2020	\$81.8M	\$55.1M	\$128.8M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
Y	Y	\$12.7M	\$3.7M	\$18.8M

Project Description:

Objective: To implement a holistic approach to fare enforcement to enable us to a) measure fare compliance system-wide, across buses, streetcars and stations; b) extend the use of Automatic Passenger Counting technology on buses and streetcars to provide accurate measurement of boardings compared to fares paid.

The project encompasses all activities to transform TTC fare collection processes including TTC's scope of work supporting Metrolinx activities for the implementation of the PRESTO farecard system, overall project management, assistance with equipment installation, upgrades to TTC facilities to accommodate PRESTO equipment, and oversight to ensure the PRESTO system fully meets TTC's business requirements.

Project Update & Accomplishments:

- Successfully deployed PRESTO Payment Solution for Cross Boundary (TTC/YRT/MiWay).
- On schedule to install PRESTO Mobile Fare Payment Application (MFPA) installation for Wheel-Trans Sedan taxis. Completed installation of 1,004 of 3,300 devices in preparation for revenue service. No critical issues remain for implementation.
- PRESTO device reliability: PRESTO card readers continue to perform below target thresholds. While a technical enhancement resulted in some improvements, additional analysis is underway with Metrolinx to identify the root cause for the PRESTO card reader technical issues.
- Stop Sell: Operational readiness planning to support November 30th, 2019 Stop Selling of TTC legacy media (tokens, tickets) is in progress.

Key Issues/Risks & Mitigation Plan:

- Business Requirements per Master Service Agreement (MSA): Fundamental business requirements such as Open Payment Functionality, (use of debit/credit cards), Service Level Agreement (SLA) and Limited Use PRESTO fare payment on bus and streetcar remain undelivered. The undelivered requirements, have been escalated to TTC and Metrolinx senior management.
- Availability data from Metrolinx may be subject to inaccuracies, continue working with Metrolinx to improve the methodology for determining availability including the frequency in which the devices are polled for availability status. Technical changes are also being developed to improve the reliability of card readers and other PRESTO equipment.

Note:

- This project is included under 5.4 Fare System as indicated in Appendix 1.
- Faregate program is not included in this up-date.
- Approved budget and completion year adjusted to reflect approval to end of 10-year envelope.
- An additional \$47 million is included as an unfunded amount for fare collection capital work to address TTC PRESTO Cash on Surface outside of the PRESTO implementation activities.

STATIONS TRANSFORMATION

Project Start	Forecast Completion Year	Approved Budget	Spend to Date	Estimated Final Cost
2017	2024	\$50.8M	\$13.1M	\$50.8M
Overall Performance		2019 YTD Budget	2019 YTD Actuals	2019 Approved Budget
Current Status	Outlook to Completion			
Y	G	\$12.3M	\$4.9M	\$17.5M

Project Description:

Objective: To enhance the customer experience by introducing Customer Service Agents (CSA), infrastructure improvements which will result in increased safety and security of TTC stations, employees and customers.

Stations Transformation involves the modernization of how we staff our stations, our communications infrastructure and our business processes. A major part of the program, the introduction of Customer Service Agents (CSA), builds on the transformation of the customer experience by adding a world-class skillset and increasing engagement with our customers. These Agents are mobile, enabling them to approach and offer assistance to customers who face barriers in accessing and using the TTC. Their mobility along with infrastructure improvements (including upgraded passenger assistance intercoms (PAI), public announcement system (PA) and CCTV cameras) will lead to the increased safety and security of our stations, employees and customers.

The milestones include those funded by the Stations Transformation budget and those that are highly related but separately funded. They are listed here together to provide a holistic picture of the status of the program in conjunction with its interdependencies.

Project Update & Accomplishments:

- Union and Kipling Hubs were constructed and are now operational.
- Bloor-Yonge, Sheppard, and St Clair West station Hubs contracts have been awarded and construction has commenced.
- PAI upgrade Phase 1 has been completed.
- PAI upgrade Phase 2 (stations without elevators) will be completed Q4 2019.
- CCTV upgrade Phase 1 (preliminary engineering work) has been completed.

Key Issues/Risks & Mitigation Plan:

- The final implementation of CSA staffing to all stations is dependent on the stop accepting date of legacy fare media.

Note:

- This program is included under 3.9 Building and Structures as indicated in Appendix 1.