



# STAFF REPORT ACTION REQUIRED

## Capital Delivery Review – Status Update #2

<b>Date:</b>	December 11, 2017
<b>To:</b>	Toronto Transit Commission Board
<b>From:</b>	Chief Executive Officer

### Summary

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In December 2016, the Board approved the staff work plan to address recommendations from the TTC Capital Program Delivery Review conducted by KPMG. The work plan, referred to as the TTC's Project Management Maturity Plan (PMM), details how the introduction of new, and refinement of existing, organizational processes will improve project management practices, ensuring standardization across the organization and establishing a cycle of continuous improvement.

The purpose of this report is to provide the second status update on the PMM Plan. It highlights the progress made against the 2017 Top 10 Priorities, the benefits of these priorities, progress towards addressing organizational gaps and introduces a top 10 list of priorities for 2018.

In response to a separate July 2017 third-party report by KPMG on TTC Board Capital Project Governance, the report will also provide a status update on the establishment of the Capital Projects and Procurement Working Group.

### Recommendations

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**It is recommended that the TTC Board:**

1. Receive this report for information.

### Financial Impact

The estimated cost of planning and implementing KPMG's recommendations over the 4-year period between 2017-2020 is \$18.5M and will be revisited annually through the budget process. The \$18.5M constitutes a 0.3% investment to establish improvements for a \$6.5 billion 10-year Base Capital Program. The implementation costs include a one-time investment of \$2.5M for consultants over a 2-year period and approximately \$4M annually for capital positions.

Consultant resources have been used to develop PMM plan deliverables such as a project management framework and board governance toolkits. They have been and will continue to fill capacity gaps until full-time positions are filled. Of the \$2.5M estimated for consultant resources, \$2M was approved as part of the 2017-2026 Capital Budget and Plan. The additional \$.5M has been included in the 2018-2026 Capital Budget and Plan.

Thirty-five capital positions are required to support this initiative. Of those 35 positions, three were approved through the 2017-2026 Capital Budget and Plan and six were identified through internal offsets. The 2018-2027 Capital Budget and Plan approved by the Board includes the remaining 26 headcount (21 in 2018 and 5 in 2019). These positions are fully funded in the 10-Year Capital Plan from the Capital project(s) that they directly support.

Once fully implemented in 2021, the ongoing annual capital cost is estimated at \$5M, which results in a 0.5% overhead going forward. The benefits of these efforts are expected to far exceed the investment and will be demonstrated through improvements to project performance.

Ultimately, project performance is measured by delivery on-time and on-budget. Project risk management, when integrated with Enterprise Risk Management (ERM), is the mechanism to begin improving how the TTC identifies, manages, and reports risks to these and all project objectives. In 2018, there will be focus on establishing these processes and providing greater visibility and confidence over the risks faced by our most critical and complex projects. Other interim success measures such as adherence to project management framework, adoption of schedule levels, improved budget performance including capacity-to-spend improvements, reduction in scope creep/changes to project baselines, etc. can be reported.

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

## **Decision History**

As outlined in the December 2016 Capital Delivery Review – Project Management Maturity (PMM) Implementation Plan Report, staff have developed a work plan to take immediate action on all of KPMG’s recommendations.

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2016/December\\_20/Reports/11\\_Capital\\_Delivery\\_Review\\_Implementation\\_Plan.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2016/December_20/Reports/11_Capital_Delivery_Review_Implementation_Plan.pdf)

In June 2017, the first status update was provided on the PMM Plan with the Board approving the approach to project governance processes as detailed in the TTC’s Project Management Framework.

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2017/June\\_15/Reports/7\\_Capital\\_Delivery\\_Review\\_Status\\_Update\\_June\\_2017\\_combined.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2017/June_15/Reports/7_Capital_Delivery_Review_Status_Update_June_2017_combined.pdf)

In addition to the PMM Plan, at the July 2017 meeting, the TTC Board directed staff to:

- Establish a Capital Projects and Procurement Working Group;
- Establish the capital project governance training as requisite training for all new TTC Board members; and
- Develop and propose a reporting protocol that establishes common expectations for the frequency and content of routine reporting including setting thresholds for exception reporting.

Refer to Appendix 3 – Detailed Decision History for additional details.

## Issue Background

At the December 2016 Board meeting, the following were identified as the 2017 top priorities (Figure 1: 2017 Top 10 Priorities). During 2017, staff made progress on all 2017 priorities.

2017 Top 10 Priorities			
1	Set Target to ‘Monitored’ (Rec#16)	6	Improve Stakeholder Management (Rec#12)
2	Establish Stage Gate Process (Rec#10)	7	Establish Delivery Options Process (Rec#27)
3	Develop Governance Toolkit (Rec#5)	8	Establish Commercial Management (Rec#30)
4	Establish a Corporate Project Management Framework (Rec# 6)	9	Ensuring Holistic Scoping (Rec#22)
5	Clarify Roles & Responsibilities for Expansion Projects (Rec#11)	10	Centralize Project Monitoring (Rec#41)

Figure 1: 2017 Top 10 Priorities

KPMG’s Capital Program Delivery Review placed an emphasis on first addressing governance, which can be defined as the set of policies, functions, responsibilities, procedures and regulations that define the establishment, management and control of a project or program. In order to advance the governance of a project there needs to be a common understanding throughout the organization on a standard definition of the:

- typical project lifecycle
- roles and responsibilities of all key stakeholders throughout that lifecycle
- ‘gates’ or decision hold points for key project decisions
- discussion on the scalability of project management practices across projects of varying risk and complexity.

## **Accessibility/Equity Matters**

The implementation of this work will have significant positive equity and accessibility impacts by ensuring that project sponsors, project managers and the wider project teams, where applicable, apply a diversity and inclusion lens to project planning, development and implementation. The TTC's business case process requires the use of the lens for newly proposed projects. Staff will continue to look for opportunities to apply the lens throughout the relevant project management processes in an effort to progress towards the TTC's ultimate goal of delivering inclusive and barrier free services, project and programs for TTC's diverse customers and employees.

The associated standards supporting the Project Management Framework have the TTC's Diversity & Inclusion lens built in (i.e., Stakeholder Management, Project Justification, Scope Definition, etc.). Capital projects will comply with the *Accessibility for Ontarians with Disabilities Act*, the Ontario Human Rights Code and all other applicable legislation to ensure barrier-free access for TTC customers and employees.

## **Comments**

The TTC has made progress on the PMM plan by continuing to advance on the 2017 priorities. A detailed status on each of these items can be found in Appendix 1 – 2017 Top 10 Priorities Update.

The 2017 priorities laid the foundational elements of the PMM plan that provided a common understanding of the processes, documents and project governance minimum requirements according to the level of project complexity and risk. Some of these core priorities have been highlighted below:

### **Project Management Framework (PMF):**

Upon instituting the PMF, a pilot list of projects that were at varying stages of implementation were selected to test the application of the PMF and to pace the roll out given the degree of impact to the organization. Stations Transformation, Wheel-Trans 10-Year Transformation and, SAP, are among the selected TTC's Category 3 and 4 projects (high criticality and complexity projects) that have been included in the pilot.

Project managers, project sponsors and steering committee members for most of these pilot projects were educated on project categorization, governance, roles and responsibilities, and stage gates. They were also taken through a case study on a current in-flight project in order to apply their knowledge. Project charters were used to confirm project categorization, determine project administrative governance structures, identify the standard corporate stage gates, and confirm budget estimates, etc. Projects that did not receive training or document project charters are still in the needs assessment phase.

### **Stage Gate Process:**

Every project, regardless of type, follows a defined project lifecycle, where the project moves between distinct and sequential phases. Dividing projects into clear phases allows

better governance and management control, by allowing each phase to have its own start and end point, and with each phase serving a specific purpose or objective.

The benefit of instituting a stage gate process ensures that a minimum level of quality control and quality assurance have been exercised, as well as to demonstrate the project management deliverable requirements are met ahead of key decision-making on projects at each stage gate.

Some of the project teams that have undergone this training have revisited their original project plans in order to determine if all project components are aligned and follow a critical path in order to achieve the benefits outlined in their respective business cases.

This new process requires a conscious organizational change in how projects are planned and delivered. Governance entities are expected to challenge the project objectives and project plans before Stage Gate 3 (project performance baseline). Once the project performance baselines (cost, schedule, scope) are set, these entities move to a support and oversight role by ensuring the benefits outlined in the business case are being achieved through the delivery of the project.

### **Governance Toolkit:**

The development of toolkits and associated guidelines provide support to each governance body in the execution of their mandate. Toolkits include the following information for each project stage in order to assist them in providing sound stewardship over their respective projects:

- objective of the phase
- expectations on the progress that should be achieved during that stage
- minimum deliverables that will be achieved
- who should be involved in approving the deliverables
- what questions should be asked in order for project to proceed to the next stage.

The TTC approached this priority by developing a toolkit framed by the stage gate process. This toolkit was used as a mechanism to train the TTC Board, project sponsors and steering committees so governance bodies are aware of the decisions to be made at each stage gate and to provide them with guidance on how to be most effective in their respective roles.

Noticeable changes have been observed within the organization with project managers presenting status updates to stakeholders. The implementation of the PMF has driven key discussions on project issues, risks and interdependencies.

### **Clarifying Roles & Responsibilities for Expansion Projects:**

Clarification of individual project roles and responsibilities contained within a project's administrative governance structure provides the project with a clear framework for it to be directed, administered and controlled. The Project Management Framework outlines the typical governance structures for Category 1, 2, 3 and 4 projects internally. Transit

Expansion (e.g. Subway Expansion, Streetcar Network Expansion, etc.) projects have been categorized as Category 4 projects.

Since June 2017, the following additional key items have been completed:

- KPMG conducted a third-party review to track progress against the PMM plan
- some organizational gaps were addressed such as adding dedicated project management resources to Service Delivery and Operations Groups
- procedural changes have been initiated with the implementation of PMF
- a capital projects and procurement working group was established.

The detailed progress with respect to these key items is highlighted below:

### **1. Annual third-party maturity assessment**

The first annual third-party maturity assessment was conducted by KPMG in November 2017. The purpose of the assessment is to:

- review and confirm progress on the 41 recommendations as committed to in December 2016
- identify how the initiatives undertaken have impacted project management maturity compared to KPMG's original report
- present the TTC Board with an assessment of maturity advancement, with recommendations on what should be emphasized for the next year.

KPMG is reporting directly to the Board on their findings as a separate agenda item.

### **2. Addressing Organizational Gaps**

The June 2017 Capital Delivery Review status report outlined the plan to address organizational capacity gaps in project management. It was noted that the areas of the organization that scored the highest on KPMG's project management maturity assessment had dedicated PMOs that served to provide their respective executives with visibility over their accountabilities, standardization of processes, and an enhanced capacity to deliver.

Referring to Figure 2: Portfolio/Project Management Organizational Structure, all PMOs will be tailored to suit the type of projects being delivered by that area of the organization, but will be required to align, standardize and be subject to compliance monitoring by the corporate PfMO (report directly to each Chief).

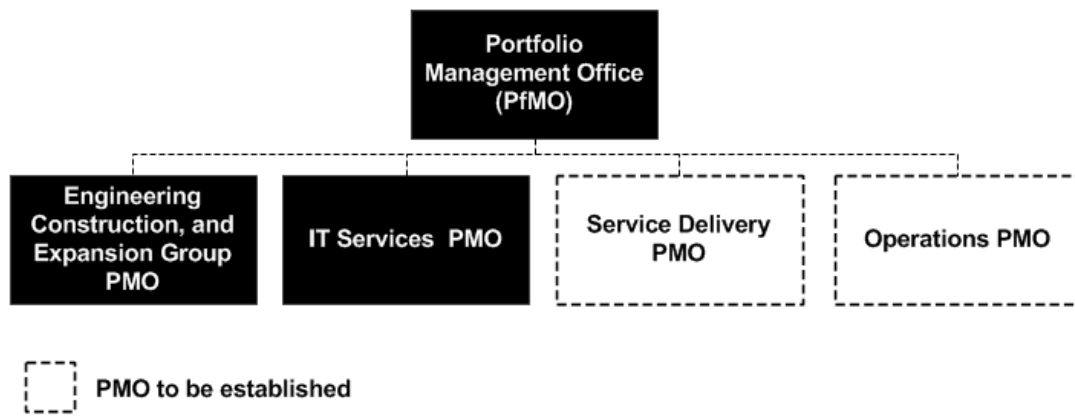


Figure 2: Portfolio/Project Management Organizational Structure

Resource capacity gaps identified in the Financial Impact section of this report include project management services in areas such as:

- project estimating
- scheduling
- commercial management
- delivery options analysis
- risk management
- performance management
- resourcing
- capital Accounting
- oversight.

Approximately 1-2 of each type of position (e.g. estimator, scheduler, commercial manager, etc.) are included in Board approved 2018-2027 Capital Budget and Plan. These 26 resources will provide permanent capacity and be used as subject management experts within the organization, with the majority of these resources residing in the Portfolio Management Office. External consultants who will be charged back to projects on a pay-per-use basis will fill gaps beyond the 26, in the short-term. By the end of 2020, another assessment will be undertaken to determine if long-term resource gaps remain within the organization.

**2.1. PMO’s Current Status: to end 2017**

Each major area that delivers capital projects/programs (ECE, IT Services, Operations and Service Delivery) is in the process of developing complimentary project management maturity plans in order to advance maturity within their respective organizations to the target state of ‘monitored’. A monitored state involves a high degree of standardization, ongoing monitoring and performance management of projects against the corporate objectives.

Service Delivery and Operations, the organizational groups found to have the lowest level of targeted maturity, added dedicated project management resources, on specific

projects and across the group, in order to accelerate project management maturity in their areas of responsibility.

## **2.2. Project Management Services Current Status: to end 2017**

The PMM plan identified that capital resources would be required to implement and build permanent capacity to maintain the steady state in areas such as project estimating, scheduling, commercial management, delivery options analysis, risk management, etc. The provision of these services primarily will be through a centralized shared services model.

The PfMO, using third-party consultants, have provided project management services centrally for those areas in the organization that do not have these services established. External consultant resources will provide immediate capacity until permanent TTC staff can be recruited and trained. A shared services model will be employed to ensure a high standard, consistency, and efficient use of resources.

## **2.3. Next Steps: to December 2018**

All PMOs will develop and implement their respective project management maturity plans. Service Delivery and Operations will initiate the establishment of PMOs for their respective groups.

The PfMO, will continue to use consultant resources to establish project management services centrally for those areas in the organization that do not already have these services established – e.g., Service Delivery and Operations. External consultant resources will provide immediate capacity until permanent resources can be recruited and trained. Recruitment of permanent resources will be initiated in Q2 2018. The request for these resources has been included within the 2018 – 2027 Capital Budget and Plan.

## **3. Procedural changes with the implementation of the Project Management Framework (PMF)**

Corporate PMF standards such as scoping, estimating, commercial management (including delivery options analysis, contract bundling), scheduling, risk management, etc. are being developed along with the procedures, tools and templates in order to enable and sustain implementation of the PMF across all of TTC's 300 capital projects. Completion and introduction of these standards, procedures, tools and templates is scheduled in 2018.

Application of these standards and other PMM plan deliverables are expected to drive significant procedural changes. In some instances, existing work practices will be revised and in other cases new systems for management will be introduced. Priorities as it relates to change management have therefore been addressed and targeted for development.



These items were broadly outlined in the original PMM plan; however, for 2018 it is acknowledged that each of the applicable TTC departments are in various stages of project management maturity development. Change Management consists of the process, tools and techniques needed to manage the people side of change to achieve the required outcomes.

Therefore, various departments in conjunction with Change Management will be developing a change management strategy. Subsequent change management plans will be developed for the PMM plan deliverables in order to continue to build awareness and obtain adoption across the organization. These plans will incorporate the development of the leadership team on being effective change leaders, starting with the project sponsors of the most complex projects to achieve sustainable results.

#### **4. Establishing a Capital Projects and Procurement Working Group**

In early 2017, KPMG was engaged to develop and deliver a set of tools that TTC Board members could use to better exercise their oversight over TTC capital projects. From February through May 2017, they completed a number of actions relating to Board project governance, culminating in workshops with TTC Board members interacting in small groups.

The expected benefits from this work, as noted by the Chair in his July 2017 memo to the Board, include:

- increased awareness among current Board members as to their roles with respect to TTC's capital projects/programs
- improved understanding of how to exercise the Board's role, including what types of concerns and questions should be raised by members throughout each of the relevant project stage gates
- greater confidence in management through a more detailed understanding of the TTC's Project Management Framework.

Due to the broad responsibilities of the Board for the oversight of the organization, many capital project intensive organizations, like the TTC, create a working group or subcommittee of their board to deal with the capital portfolio. Recognizing the limited time available in board meetings, a working group allows the necessary time and focus on the capital project portfolio. Establishment of this group permits a greater understanding and input by selected Board members to TTC's capital project delivery.

##### **4.1. Current Status:**

In July, the Board directed staff to establish a Capital Projects and Procurement Working Group (CPPWG). The first CPPWG meeting was held in November, with the next meeting scheduled for February 2018. This group is comprised of the Deputy CEO, select executive staff responsible for the delivery of Capital Projects across the TTC and three TTC Board members.

The CPPWG advises staff on ways and means to achieve improved project management practices and outcomes at the TTC. The group provides advice on the development of TTC procurement policies and practices, and future information technology changes that specifically impact transit. It is not a forum to authorize or approve any policy, reports, action plans, documents etc.

#### **4.2. Next Steps:**

##### **Capital Governance Training**

In order to maintain the awareness among current and future Board members about their role with respect the TTC's capital projects/programs, a training workshop will be developed. This workshop will be a requirement for all new TTC Board members and for any member of the Capital Projects and Procurement Working Group.

The workshops will focus on the principles of good governance, both internal and external, and the content of the Project Management Framework. Good governance ensures that a project is aligned with the major stakeholders' needs and objectives. Project governance sets the framework under which project leadership can be empowered to make decisions that meet the objectives of the major stakeholders and provides for ways to address circumstances where stakeholders may not be aligned.

##### **PMM plan success measures**

Ultimately, project performance is measured by delivery on-time and on-budget. Project risk management, when integrated with Enterprise Risk Management (ERM), is the mechanism to begin improving how the TTC identifies, manages, and reports risks to these and all project objectives. In 2018, there will be a focus on establishing these processes and providing greater visibility and confidence over the risks faced by our most critical and complex projects.

Other interim measures for success include process quality metrics that span across the following categories:

- Project Management Maturity – the scope of this is focused on the PMM plan performance.
- Policy & Standards – these measures include group/departmental project management maturity, adherence to the Project Management Framework and adherence to project management standards.
- Project Performance – these measures include on-time performance, adoption of schedule and estimate levels, schedule and estimate maturity, schedule and estimate integrity, improved risk management, budget performance, stakeholder satisfaction, and changes to project baselines.
- Portfolio Performance – these measures include roll-ups of project performance (schedule, budget, scope).

- Employee Performance & Training – these measures include PM Goal setting, training and qualifications, project management performance assessment and project management competency assessment.

These measures, including those generated through the improved management of project risk, have been selected in order to ensure that we are addressing the key themes found in the KPMG Capital Delivery Review.

### **2018 Top 10 Priorities**

In order to sustain the momentum on the PMM plan, a new set of priorities have been developed for 2018 (Figure 3: 2018 Top 10 Priorities). These items were included in the original PMM Plan, however, for 2018 the TTC will be focusing attention on:

- identifying project management competencies and qualifications, and developing a learning and developmental strategy and plan
- identifying resource limitations and associated costs for inclusion in subsequent budget cycles
- identifying group/project-type specific process and procedural requirements for further development
- continuing the pilot for the Project Management Framework (PMF), stage gating, stakeholder management on selected listing of projects in order to assess the rate of change and ensure its progressive success within the organization through staged implementation
- developing a data strategy that identifies capital program data requirements, and aims to collect the data at the source to minimize the needs for reprocessing of data
- ensuring that the concepts brought forward in the 2017 Top 10 Priorities can be applied to TTC's finite projects and tailored for the applications of ongoing programs.

The following have been identified as the 2018 Top 10 priorities:

2018 Top 10 Priorities			
1	Establish Capital Program Strategic Objectives (Rec# 2)	6	*Develop Group Specific Project Management Maturity Plans
2	Establish a Corporate Program Management Framework (Rec# 6)	7	Expand Strategic Role of Procurement (Rec# 29)
3	Establish a Corporate Portfolio Management Framework (Rec# 6)	8	Develop a Corporate Capital Projects Data Strategy (Rec# 32)
4	Establish a Benefits Realization Framework	9	*Enhance Capital Planning and Performance
5	Establish Minimum Project Management Competencies and Define Learning and Development Strategy (Rec# 15)	10	*Establish Project Management Resource Review

Figure 3: 2018 Top 10 Priorities

Note: \*Internal priorities that were identified in the PMM plan that were beyond the 41 KPMG recommendations. For a detailed list of benefits and deliverables, refer to Appendix 2 – 2018 Top 10 Priorities.

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## Appendices

- Appendix 1 – 2017 Top 10 Priorities Update
- Appendix 2 – 2018 Top 10 Priorities
- Appendix 3 – Detailed Decision History

## Appendix 1 – 2017 Top 10 Priorities Update

This table (Figure 4: 2017 Top 10 Priorities – Q3/4 2017 Status Update) represents items that have been completed since the Capital Delivery Review – June 2017 Status Update report and next steps for that priority (upcoming deliverables and their associated estimated completion timeframes).

<b>2017 Top 10 Priorities Q3/4 2017 Status Update</b>	
<b>1. Setting a Maturity Target of ‘Monitored’ (Rec #16)</b>	
No change since the last update. This priority was completed in June 2017.	
<b>2. Establishing a Stage Gate Process (Rec #10)</b>	
Complete	All select Category 3 & 4 projects, which were early in their project lifecycle, had their stage gates formalized through a Project Charter.
Complete	Existing templates (Business Case, Project Change Request and project status report) have been revised to incorporate this process.
<b>Next Steps</b>	Existing and future templates are to be revised to incorporate this process (i.e., Board reports, dashboards, etc.).
<b>3. Developing Governance Toolkits (Rec# 5)</b>	
Complete	KPMG presented an independent report, including recommendations on how the TTC’s Board can strengthen their oversight and stewardship of the TTC’s Capital Portfolio.
Complete	Toolkits were developed for project sponsors and steering committees that are involved in the delivery of capital projects.
<b>Next Steps</b>	Toolkits will be developed for all governance bodies that are involved in the delivery of capital projects.
<b>4. Establishing a Corporate Project Management Framework (Rec# 6)</b>	
Complete	The Project Management Framework was deployed to a selection of Category 3 & 4 projects. Projects that were early in their project lifecycle, formalized their understanding of the PMF through a project charter.
<b>Next Steps</b>	The Project Management Framework will be deployed to all of the remaining Category 3 & 4 projects, and initiated on the Category 2 projects, which represent the majority of the projects being implemented at TTC under its capital portfolio.

## **2017 Top 10 Priorities Q3/4 2017 Status Update**

### **5. Clarifying Roles & Responsibilities (Rec #11)**

No change since the last update.

**Next Steps** Roles & responsibilities for Category 4 (Transit Expansion) projects will continue to be developed. The TTC will work with the City, using the PMF as an input, to apply best practices to all City capital projects

### **6. Improving Stakeholder Management Protocols (Rec# 12)**

No change since the last update.

**Next Steps** Guidelines, templates, and a training program will be developed and deployed to all staff and stakeholders involved in the initiating, planning and delivery of Category 2 and above projects.

These projects and programs will start developing their own specific stakeholder management plans to ensure they will meet or exceed corporate expectations.

### **7. Establishing a Delivery Options process (Rec# 27)**

**Complete** Consultants are available to provide delivery options analysis services for specific projects. These services will be charged back to the individual projects.

**Next Steps** The TTC's procurement policy will be revised to require delivery options analysis for Category 3 and 4 projects.

### **8. Establishing a Commercial Management process (Rec# 30)**

**Complete** An RFP to support the implementation of the PMM Plan was issued for tender in Q2 2017. This RFP included obtaining consultant expertise to draft a commercial management process. This contract was awarded in June 2017.

**Complete** Consultants are available to provide commercial management services for Category 3 & 4 projects until the capability is built in-house. These services will be charged back to the individual projects.

**Next Steps** Develop training strategy for in-house project management staff.

### **9. Ensuring Holistic Scope Definition (Rec #22)**

**Complete** Holistic scoping requirements have been established in the Corporate Project Management Framework (see Rec# 6).

**Next Steps** Holistic scoping will also be integrated in stakeholder management plans (see Rec#12).

## 2017 Top 10 Priorities Q3/4 2017 Status Update

### 10. Establishing Centralized Project Monitoring (Rec# 41)

Complete            An RFP to support the implementation of the PMM Plan was issued for tender in Q2 2017. This RFP included obtaining consultant expertise to assess the organization's progress against the project management maturity target. This contract was awarded June 2017.

Complete            .  
A consultant has been engaged to conduct management reviews of projects based on defined risk-based selection criteria.

**Next Steps**            This priority has been completed.

Figure 4: 2017 Top 10 Priorities – Q3/4 2017 Status Update

For a detailed explanation on the benefits and deliverables for the 2017 Top 10 Priorities refer to “Appendix 1 – Top 10 Priorities Update” of the Capital Delivery Review Status Update June 2017 Board Report:

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2017/June\\_15/Reports/7\\_Capital\\_Delivery\\_Review\\_Status\\_Update\\_June\\_2017\\_combined.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2017/June_15/Reports/7_Capital_Delivery_Review_Status_Update_June_2017_combined.pdf)

## **Appendix 2 – 2018 Top 10 Priorities**

### **1. Establish Capital Program Strategic Objectives (Rec #2)**

Having a broadly communicated and enforced capital program delivery vision, mission and strategic objectives sets a clear backdrop for all stakeholders when making important strategic decisions about capital projects. Coupled with a staged decision making process, these objectives underpin the ‘go-no go’ questions that determine whether a project in its existing form is approved to advance to the next stage.

Clear objectives allow all stakeholders, whether they are TTC staff, executives, TTC Board, City of Toronto stakeholders or the public to probe the value of projects on common grounds, leading to transparent decision making. Maintaining strict alignment to strategic objectives requires discipline from all stakeholders but doing so can greatly improve the reputation of the decision making process.

#### *Deliverables:*

- A Project Management Policy will be established to document the capital program’s strategic objectives. (Rec #2)

*Cost/Funding:* Accommodated within existing resources and funding.

### **2. Establish a Corporate Program Management Framework (Rec #6)**

The Project Management Framework (PMF) sets out expectations for the management of projects based on their level of complexity and risk. This framework, built on the agreed-upon internal project governance structure, will be a top level document and serve as an entry point for the broader project management team. It will ensure that the interfaces among functional groups are clear. Key touch points among these groups at all stages of the project lifecycle will be documented to provide assurance of sound management of the project, appropriate oversight, seamless handoffs between functional groups, and risk management.

Through the development of the PMF, it was determined that complementary Program and Portfolio Management Frameworks need to be developed due to the complexity of the TTC’s capital portfolio.

#### *Deliverables:*

- A program management framework will be developed. This document will be continuously expanded upon to reflect progress against the Project Management Maturity Plan.

*Cost/Funding:* Effective with the 2017- 2026 Capital Budget the funding and resources were approved.



### **3. Establish a Corporate Portfolio Management Framework (Rec#6)**

The Project Management Framework (PMF) sets out expectations for the management of projects based on their level of complexity and risk. This framework, built on the agreed-upon internal project governance structure, will be a top level document and serve as an entry point for the broader project management team. It will ensure that the interfaces among functional groups are clear. Key touch points among these groups at all stages of the project lifecycle will be documented to provide assurance of sound management of the project, appropriate oversight, seamless handoffs between functional groups, and risk management.

Through the development of the PMF, it was determined that complementary Program and Portfolio Management Frameworks need to be developed due to the complexity of the TTC's capital portfolio.

#### *Deliverables:*

- A portfolio management framework will be developed. This document will be continuously expanded upon to reflect progress against the Project Management Maturity Plan.

*Cost/Funding:* Effective with the 2017- 2026 Capital Budget the funding and resources were approved.

### **4. Establish a Benefits Realization Framework (Rec# 8)**

The success of a project is determined by its ability to deliver on the strategic objectives of the organization as they relate to that project. In order to track successful completion of these objectives a robust performance management function is required. Class-leading organizations have a performance management framework that clearly defines expectations of the project team members throughout the lifecycle of a project, including how to manage a project to the TTC's goals and strategic objectives. The frameworks are proactively managed, consistently monitored; undergo regular updating, and continuous improvement. Performance management frameworks enable proactive risk identification and are integrated with the performance management metrics for reporting and escalation.

#### *Deliverables:*

- Develop a database of benefits (performance metrics) from existing approved business cases for projects approved under the Capital Portfolio
- Develop a benefits realization framework
- Implement a benefits (performance metrics) monitoring function

*Cost/Funding:* Effective with the 2017- 2026 Capital Budget the funding and resources were approved.

## **5. Establish Minimum Project Management Competencies and Define Learning and Development Strategy (Rec #15)**

There is currently a lack of corporately defined minimum qualifications and competencies for project management team members, which takes into account the size and complexity of the projects. Project managers can therefore be assigned to projects for which they are not qualified. To compete for individuals who are highly qualified to deliver transit capital projects with other transit agencies, consultants or contractors in the Greater Toronto Area, it is important for the TTC to strive for excellence when it comes to competency management for both successful project outcomes and also to attract and keep top talent in its professional ranks.

In order to meet these minimum qualifications and competencies a learning and developmental strategy and plan will be developed to support project team members where gaps are identified; including identifying any training development and execution resource gaps. The strategy will specify what needs to be done to close any identified gaps and could include initiatives such as peer support, eLearning, internal and external training just to name a few. The development of the strategy and plan will require an assessment of the learning needs and objectives of the impacted employees, the development of or revisions to existing courses and identification of facilitators where necessary. The learning and development plan(s) outlines how the strategy will be executed.

In order to be class-leading, current and required competencies should be well mapped, formalized, integrated with human resources and monitored effectively with their complimentary learning and development plans.

### *Next Steps:*

- Establish minimum qualifications for program and project managers. These qualifications will be aligned with project categorization levels.
- Develop a training strategy

*Cost/Funding:* Effective with the 2017- 2026 Capital Budget the funding and resources were approved. Once the learning and development strategy has been finalized, resource and budget estimates will be revisited as part of the 2019-2028 budget submission.

## **6. Develop Group Specific Project Management Maturity Plans**

The June 2017 Capital Delivery Review status report outlined the plan to address organizational capacity gaps in project management. It was noted that the areas of the organization that scored the highest on KPMG's project management maturity assessment had dedicated PMOs that served to provide their respective executives with visibility over their accountabilities, standardization of processes and an enhanced capacity to deliver.

Each major area that delivers capital projects/programs (ECE, IT Services, Operations and Service Delivery) are in the process of developing or have developed complimentary project management maturity plans in order to advance maturity within their respective

organizations to the target state of ‘monitored’. A monitored state involves a high degree of standardization, ongoing monitoring and performance management of projects against the corporate objectives (KPIs).

Corporate standards and processes should be leveraged to develop and/or update group level standards and processes. At the group level, it is important to cater to the technical requirements of the diverse functional groups. Where group level standards and processes already exist, they will need to be updated to reflect the policy decision which underlie the corporate standards and processes, as well as referencing their corporate counterparts as necessary. New/updated group level standards and processes should expand on the corporate standards and processes by relating them to the characteristics delivered within each functional group.

*Status:*

- Develop group specific project management maturity plans for 2018-2020 that will improve project management practices within in each group.
- Implement 2018 deliverables from the group specific maturity plans.

*Cost/Funding:* Effective with the 2017- 2026 Capital Budget the funding and resources were approved.

## **7. Expand Strategic Role of Procurement (Rec #29)**

Procurement planning ensures there is an agreement on a clear and specific project scope, an assessment of qualified and available resources, considers influences that may affect a buying decision, and ultimately develops the strategy for the procurement activities to be performed. The goal of procurement planning is to achieve the optimum balance of risk, control and funding for a project, all responsibilities related to the project manager.

Project procurement involves numerous inputs from multiple stakeholders to determine the right procurement strategy. The TTC can expand the strategic role of procurement in the capital program delivery process by highlighting the importance of broad stakeholder engagement.

*Deliverables:*

- The TTC’s procurement policy will be revised to require delivery options analysis for Category 3 and 4 projects.

*Cost/Funding:* Effective with the 2017- 2026 Capital Budget the funding and resources were approved.

## **8. Develop a Corporate Capital Projects Data Strategy (Rec# 31-34)**

A key element of successful project outcomes is making decisions based on information at the project, program and portfolio levels. Timely decision- making requires having the right data at the right time to help make the right decision.

*Next Steps:*

- Identify all data sources that are critical to the TTC's capital program decision making.
- Develop a capital program data strategy that identifies capital program data requirements, and aims to collect the data at the source to minimize the needs for reprocessing of data.

*Cost/Funding:* Effective with the 2017- 2026 Capital Budget the funding and resources were approved.

**9. Enhance Capital Planning and Performance (formerly “Corporate Capital Budget Service Established”)**

The purpose of this PMM Plan program is to increase the project management maturity of the organization. In order to enable project teams to become more mature additional resources will be added to the Finance, Capital Accounting team to enhance capital planning and performance.

These positions will assist the organization in identifying and formulating organizational budget impacts during the development of the business cases and project change requests during project justification. The business case development can advanced to a new level through the monetization of benefits and the addition of return on investment (ROI), payback and internal rate of return calculations. They will assist the PfMO to develop a project cost and commitment-tracking tool for project managers. This will help to inform the Project Management Information System (PMIS) requirements.

These positions will also support prioritization, long-term capital planning (including opportunities to address the unfunded list), opportunities to enhance the capital spend rate, capacity to spend analysis and readiness to proceed.

As new project leaders are added to the organization, or are promoted, they require consistent education and support on our budget process, as well as the related reporting.

The request for these positions was endorsed through the approval of the June 2017 Capital Delivery Review – Status update and included in the 2018-2027 budget submission. These resources will be provided as a corporate function to all project teams across the organization and funded from the capital projects that they directly support.

*Deliverables:*

- Support business case development
- Support capital project prioritization
- Enhance long-term capital planning
- Enhance capital spend rate

*Cost/Funding:* Initial resource requirements were approved as part of the 2017 Budget process. Added resources to continue to advance program implementation are included in the Board approved 2018 – 2027 Capital Budget and Plan.

#### **10. Establish a project management resource review (Rec# n/a)**

A resource manager will develop a resource allocation plan, which is an important tool in effective management of scarce resources. The resources of an organization consist of people, materials, equipment, knowledge and time.

Organizations typically have limited resources; therefore, trade-offs on what project resources are expended and when are made every day within organizations. The timing of the need of those resources can be and should be determined within the project schedules. A resource plan, which describes the type of resource needed and the timing of that need, is critical to effective resource management. As the project schedule changes, the resource plan must also be flexible enough to adjust as these changes occur.

The request for these positions was endorsed through the approval of the June 2017 Capital Delivery Review – Status update and included in the 2018-2027 budget submission. These resources will be provided as a corporate function to all project teams across the organization and funded from the capital projects that they directly support.

*Deliverables:*

- Identify project staffing resource gaps on Category 2 & 3 projects

*Cost/Funding:* Included within the 2018 – 2027 Capital Budget and Plan.

## Appendix 3 – Detailed Decision History

On March 10, 2015, City Council, as part of the 2015 Capital Budget process, directed the City Manager to issue a Request for Proposal to undertake a review of TTC capital program delivery, including a review of project management of TTC major capital projects; staff reporting mechanisms to the TTC Board and City Council; and future options for transit project management and delivery of major capital projects. City Council directed the City Manager to co-ordinate the review with the Chief Executive Officer, TTC and to report to the TTC Board.

Link: <http://app.toronto.ca/tmmis/viewAgendaItemHistory.do?item=2015.EX3.4>

At its meeting of September 28, 2016, the Board received the presentations for information and approved the recommendations in the staff report, as follows:

1. The TTC Board request the Chief Executive Officer, TTC to report to the December 2016 meeting of the TTC Board on an implementation plan, identifying timing and any new capital resources or investment required.
2. The TTC Board request the Chief Executive Officer, TTC to work in partnership with the City Manager to review and develop the implementation plan for recommendations that form part of Group 3 [of the] report.
3. The TTC Board request the Chief Executive Officer, TTC to provide a semi-annual report to the TTC Board on the status of implementing the recommendations contained in [the] report.

The Board also approved the following motions:

1. Request that the City Manager initiate a review of the City of Toronto capital program delivery, including a review of project management of major capital projects for all City departments and other Agencies, Boards, and Corporations; staff reporting mechanisms to City Council and/or boards; and future options for project management and delivery of major capital projects;
2. Request that the City Manager report back to Executive Committee and the TTC Board on the feasibility of a Major Capital Project Task Force. The Task Force would provide project management and coordination for all major capital projects for City departments, and Agencies, Boards, and Corporations. Resources for this group should be found within existing budgets and would be comprised of senior staff from Engineering and Construction Services, Transportation, the TTC and other departments with project delivery expertise.
3. Request that the City Manager report on which of the 41 recommendations found in the TTC Capital Program Delivery Review have been or will be adopted by the City.
4. Request staff to transmit this report and the Board's decision to the Executive Committee of City Council and to advise the Executive Committee that an implementation report will be coming forward to the Board in December and will be forwarded to the Executive Committee at that time.

Note: The Executive Committee, at their meeting in October, deferred the final report on the TTC Capital Program Delivery Review and requested it be brought back in January along with the implementation plan (December 20, 2016 report).

Presentations:

- TTC Capital Program Review (For Action)  
[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2016/September\\_28/Reports/3\\_TTC\\_Capital\\_Program\\_Review.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2016/September_28/Reports/3_TTC_Capital_Program_Review.pdf)
- 3.1 Capital Program Delivery Review  
[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2016/September\\_28/Reports/3-1\\_TTC\\_Capital\\_Program\\_Delivery\\_Review.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2016/September_28/Reports/3-1_TTC_Capital_Program_Delivery_Review.pdf)
- 3.2 Capital Delivery Review – Management Response  
[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2016/September\\_28/Reports/3-2\\_CEO\\_RESPONSE\\_TO\\_TTC\\_CAPITAL\\_PROGRAM\\_DELIVERY\\_REVIEW%20%28Fin.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2016/September_28/Reports/3-2_CEO_RESPONSE_TO_TTC_CAPITAL_PROGRAM_DELIVERY_REVIEW%20%28Fin.pdf)

Decision:

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2016/September\\_28/Reports/Decisions/TTC\\_Capital\\_Program\\_Review.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2016/September_28/Reports/Decisions/TTC_Capital_Program_Review.pdf)

At its meeting of December 20, 2016, the Board:

1. Approved the preliminary Project Management Maturity Plan as outlined in the body of this report;
2. Requested staff report back on a semi-annual basis beginning in June 2017 to provide an updated Project Management Maturity Plan along with the status of progress made against the plan;
3. Requested staff transmit an annual third-party report to track progress against the Project Management Maturity Plan beginning in December 2017; and
4. Directed staff to forward this item to the City Clerk for consideration at the January 19, 2017 meeting of the Executive Committee on Item EX18.26: Toronto Transit Commission Capital Program Delivery Review.

Capital Delivery Review – Implementation Plan Report:

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2016/December\\_20/Reports/11\\_Capital\\_Delivery\\_Review\\_Implementation\\_Plan.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2016/December_20/Reports/11_Capital_Delivery_Review_Implementation_Plan.pdf)

Decision:

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2016/December\\_20/Reports/Decisions/Capital\\_Delivery\\_Review-PM\\_Maturity\\_Implementation.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2016/December_20/Reports/Decisions/Capital_Delivery_Review-PM_Maturity_Implementation.pdf)

On January 31, 2017, City Council adopted the following recommendations from the City's Executive Committee:

1. City Council request the City Manager to initiate a review of the City of Toronto capital program delivery including a review of project management of major capital projects for all City divisions and other Agencies, Boards, and Corporations; staff reporting mechanisms to City Council and/or boards; and future options for project management and delivery of major capital projects.
2. City Council request the City Manager to report back to the Executive Committee and the Toronto Transit Commission Board on the feasibility of a Major Capital Project Task Force. The Task Force would provide project management and coordination for all major capital projects for City departments, and Agencies, Boards, and Corporations. Resources for this group should be found within existing budgets and would be comprised of senior staff from Engineering and Construction Services, Transportation, the Toronto Transit Commission and other departments with project delivery expertise.
3. City Council request the City Manager to report to the Executive Committee in the third quarter of 2017 on the feasibility of establishing a Major Capital Infrastructure Office which would:
  - a. be led by "best in class" public infrastructure experts;
  - b. utilize the best management and financial practices and the appropriate elements of the KPMG Capital Program Delivery Review for the Toronto Transit Commission;
  - c. deliver major City infrastructure projects on time and on budget; and
  - d. Include staff from Engineering and Construction Services, Transportation Services and other major divisions and agencies.
4. City Council request the City Manager to include in the report in Part 3 above appropriate large infrastructure projects that could be assumed by the Major Capital Infrastructure Office.
5. City Council request that the City Manager report on which of the 41 recommendations found in the Toronto Transit Commission Capital Program Delivery review have been or will be adopted by the City.

Decision:

<http://app.toronto.ca/tmmis/viewAgendaItemHistory.do?item=2017.EX21.14>

At its meeting of June 15, 2017, the Board:

1. Approved the proposed approach to project governance processes as detailed in the TTC's PMF, including:
  - a. Criteria for project categorization;
  - b. Project governance structures; and
  - c. Stage gate model and deliverables
2. Requested that the report be forwarded to the City Manager for consideration during their review of the City of Toronto capital delivery program.

Capital Delivery Review (Project Management Maturity Plan) Status Update for June 2017 Report:

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2017/June\\_15/Reports/7\\_Capital\\_Delivery\\_Review\\_Status\\_Update\\_June\\_2017\\_combined.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2017/June_15/Reports/7_Capital_Delivery_Review_Status_Update_June_2017_combined.pdf)



Decision:

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2017/June\\_15/Reports/Decisions/7\\_Capital\\_Delivery\\_Review-Status\\_Update.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2017/June_15/Reports/Decisions/7_Capital_Delivery_Review-Status_Update.pdf)

At its meeting of July 12, 2017, the Board approved the following:

1. Accept KPMG's attached Summary Report and utilize the toolkit to exercise our oversight accountabilities over the TTC's capital program;
2. Establish a Capital Projects and Procurement Working Group to provide TTC Board members and TTC management adequate time and focus to assess business cases and other stage gate deliverables and to report back to the TTC Board on its findings.
3. Establish the capital project workshop as requisite training for all new TTC Board members and pre-requisite training for any member of the Capital Projects and Procurement Working Group;
4. Request staff develop and propose a reporting protocol that establishes common expectations for the frequency and content of routine reporting and that sets thresholds for exception reporting; and
5. Forward this letter as well as KPMG's report and toolkit to the City Manager's Office for possible application more broadly across the City of Toronto.

Correspondence: TTC Board Capital Project Governance (submitted by TTC Chair Colle):

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2017/July\\_12/Reports/13\\_Correspondence\\_TTC\\_Board\\_Capital\\_Project\\_Governance.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2017/July_12/Reports/13_Correspondence_TTC_Board_Capital_Project_Governance.pdf)

Decision:

[http://www.ttc.ca/About\\_the\\_TTC/Commission\\_reports\\_and\\_information/Commission\\_meetings/2017/July\\_12/Reports/Decisions/13\\_Correspondence\\_Board\\_Capital\\_Project\\_Governance.pdf](http://www.ttc.ca/About_the_TTC/Commission_reports_and_information/Commission_meetings/2017/July_12/Reports/Decisions/13_Correspondence_Board_Capital_Project_Governance.pdf)