RESOLUTION ALLOCATING \$5,464,675 IN PROP K FUNDS, WITH CONDITIONS, FOR THE DOWNTOWN EXTENSION, INCLUDING \$4,549,675 FOR PRELIMINARY ENGINEERING AND \$915,000 FOR A TUNNELING OPTIONS ENGINEERING STUDY, AND APPROPRIATE \$200,000 FOR OVERSIGHT OF THE DOWNTOWN EXTENSION, SUBJECT TO THE ATTACHED FISCAL YEAR CASH FLOW DISTRIBUTION SCHEDULES

WHEREAS, The Transportation Authority received two Prop K requests for \$5,464,675 for the Downtown Extension (DTX), including \$4,549,675 for Preliminary Engineering and \$915,000 for a Tunneling Options Engineering Study, and staff is requesting appropriation of \$200,000 for Oversight of the DTX, as summarized in Attachments 1 and 2 and detailed in the attached allocation request forms; and

WHEREAS, The requests seek funds from the following Prop K Expenditure Plan category:

Downtown Extension to Rebuilt Transbay Terminal; and

WHEREAS, As required by the voter-approved Expenditure Plans, the Transportation Authority Board has programmed funds for the aforementioned Expenditure Plan category in the Prop K Strategic Plan; and

WHEREAS, The Transbay Joint Powers Authority's requests for the Downtown Rail Extension (DTX) project require a concurrent Prop K Strategic Plan amendment to advance \$3,040,777 programmed for the DTX in Fiscal Year (FY) 2033/34 in the Downtown Extension to Rebuilt Transbay Terminal category and to concurrently grant an exception to Strategic Plan policy setting aside all remaining funds not already programmed to Phase 1 (the Transbay Transit Center) for construction of Phase 2 (DTX); and

WHEREAS, The requested Strategic Plan amendment would result in a negligible increase

(0.06%) to the amount of available funds spent on financing for the program as a whole; and

WHEREAS, After reviewing the request, Transportation Authority staff recommended allocating a total of \$5,464,675 in Prop K funds, with conditions, for the DTX, including \$4,549,675 for Preliminary Engineering and \$915,000 for a Tunneling Options Engineering Study, and appropriation of \$200,000 for Oversight of the DTX, as described in Attachment 3 and detailed in the attached allocation request forms, which include staff recommendations for Prop K allocation amounts, required deliverables, timely use of funds requirements, special conditions, and Fiscal Year Cash Flow Distribution Schedules; and

WHEREAS, There are sufficient funds in the Capital Expenditures line item of the Transportation Authority's approved Fiscal Year 2016/17 budget to cover the proposed action; now, therefore, be it

RESOLVED, That the Transportation Authority hereby amends the Downtown Extension to Rebuilt Transbay Terminal category of the Prop K Strategic Plan to advance \$3,040,777 programmed for the DTX in Fiscal Year (FY) 2033/34 and to concurrently grant an exception to Strategic Plan policy setting aside all remaining funds not already programmed to Phase 1 for construction of Phase 2 (DTX); as detailed in the attached allocation request forms; and be it further

RESOLVED, That the Transportation Authority hereby allocates \$5,464,675 in Prop K funds, with conditions, for the DTX, including \$4,549,675 for Preliminary Engineering and \$915,000 for a Tunneling Options Engineering Study, and appropriates \$200,000 for Oversight of the DTX as summarized in Attachment 3 and detailed in the attached allocation request forms; and be it further

RESOLVED, That the Transportation Authority finds the allocation of these funds to be in conformance with the priorities, policies, funding levels, and prioritization methodologies established in the Prop K Expenditure Plan, and the Strategic Plan; and be it further



RESOLVED, That the Transportation Authority hereby authorizes the actual expenditure (cash reimbursement) of funds for these activities to take place subject to the Fiscal Year Cash Flow Distribution Schedules detailed in the attached allocation request forms; and be it further

RESOLVED, That the Capital Expenditures line item for subsequent fiscal year annual budgets shall reflect the maximum reimbursement schedule amounts adopted and the Transportation Authority does not guarantee reimbursement levels higher than those adopted; and be it further

RESOLVED, That as a condition of this authorization for expenditure, the Executive Director shall impose such terms and conditions as are necessary for the project sponsor to comply with applicable law and adopted Transportation Authority policies and execute Standard Grant Agreements to that effect; and be it further

RESOLVED, That as a condition of this authorization for expenditure, the project sponsor shall provide the Transportation Authority with any other information it may request regarding the use of the funds hereby authorized; and be it further

RESOLVED, That the Capital Improvement Program of the Congestion Management Program is hereby amended, as appropriate.

#### Attachments (6):

- 1. Summary of Applications Received
- 2. Project Descriptions
- 3. Staff Recommendations
- 4. Prop K Allocation Summary FY 2016/17
- 5. Proposed Amended Strategic Plan
- 6. Prop K Allocation Request Forms (3)

#### Attachment 1: Summary of Applications Received

							L	everaging		
Source	EP Line No./ Category <sup>1</sup>	Project Sponsor <sup>2</sup>	Project Name	]	Current Prop K Request	Total Cost for Requested Phase(s)	Expected Leveraging EP Line		Phase(s) Requested	District
Prop K	5	ТЈРА	Downtown Extension - Preliminary Engineering	\$	4,549,675	\$ 130,297,41	6 86%	96%	Design	6
Prop K	5	ТЈРА	Downtown Extension - Tunnel Engineering Options Study	\$	915,000	\$ 34,184,10	6 86%	39%	Design	6
Prop K	5	ТЈРА	Downtown Extension - Additional Oversight/ Peer Review	\$	200,000	\$ 200,00	86%	0%	Design	6
			TOTAL	\$	5,664,675	\$ 164,681,58	2 86%	84%		

#### Footnotes

<sup>&</sup>lt;sup>1</sup> "EP Line No./Category" is either the Prop K Expenditure Plan line number referenced in the 2014 Prop K Strategic Plan or the Prop AA Expenditure Plan category referenced in the 2012 Prop AA Strategic Plan, including: Street Repair and Reconstruction (Street), Pedestrian Safety (Ped), and Transit Reliability and Mobility Improvements (Transit).

<sup>&</sup>lt;sup>2</sup> Acronym: TJPA (Transbay Joint Powers Authority)

<sup>&</sup>lt;sup>3</sup> "Expected Leveraging By EP Line" is calculated by dividing the total non-Prop K funds expected to be available for a given Prop K Expenditure Plan line item (e.g. Pedestrian Circulation and Safety) by the total expected funding for that Prop K Expenditure Plan line item over the 30-year Expenditure Plan period. For example, expected leveraging of 90% indicates that on average non-Prop K funds should cover 90% of the total costs for all projects in that category, and Prop K should cover only 10%.

<sup>&</sup>lt;sup>4</sup> "Actual Leveraging by Project Phase" is calculated by dividing the total non-Prop K or non-Prop AA funds in the funding plan by the total cost for the requested phase or phases. If the percentage in the "Actual Leveraging" column is lower than in the "Expected Leveraging" column, the request (indicated by yellow highlighting) is leveraging fewer non-Prop K dollars than assumed in the Expenditure Plan. A project that is well leveraged overall may have lower-than-expected leveraging for an individual or partial phase.

# Attachment 2: Brief Project Descriptions <sup>1</sup>

EP Line No./ Category	Project Sponsor	Project Name	Prop K Funds Requested	Project Description
5	ТЈРА	Downtown Extension - Preliminary Engineering	\$ 4,549,675	In response to feedback provided by the SFCTA Board, the current revised request will bring design of the Downtown Extension (DTX) to 30% for new elements and modified elements (per the SEIR/SEIS) that are common to all alignments being evaluated in the Planning Department's Railyard Alternatives and I-280 Boulevard Feasibiliy Study. The work is scheduled to be complete by December 2017. DTX is Phase 2 of the Transbay Transit Center (TTC) Program. Phase 2 is a 1.3-mile Downtown Rail Extension (DTX) tunnel that extends Caltrain commuter rail from its current terminus at Fourth and King streets to the new Transbay Transit Center (TTC). It also completes the build-out of the below-grade train facilities at the TTC, a new underground station along the DTX alignment, an intercity bus facility, and provides the tracks and northern terminus for California's future High-Speed Rail system.
5	ТЈРА	Downtown Extension - Tunnel Engineering Options Study	\$ 915,000	The subject request is for an engineering study to analyze opportunities to reduce surface impacts due to construction of DTX. The subject request to fund a Tunnel Options Engineering Study would focus on three areas: Throat cut-and-cover (west side of the Transbay Transit Center where three tracks need to fan into six tracks); Townsend Cut-and-Cover; and the Third/Townsend ventilation structure site. The work is scheduled to be complete within 3 months of issuing a Notice to Proceed.

# Attachment 2: Brief Project Descriptions <sup>1</sup>

EP Line No./ Category	Project Sponsor	Project Name	_	K Funds	Project Description
5	ТЈРА	Downtown Extension - Additional Oversight/ Peer Review	\$	200,000	In response to the Board's interest in increased oversight for the Transbay Transit Center, the work to be performed under this appropriation is intended to complement and enhance the SFCTA's ongoing oversight functions. It is the intent of the SFCTA staff to engage independent experts in the areas of tunneling/underground construction, cost estimating, funding, and right-of-way to participate in charrettes, workshops, peer reviews, and deliverables review to assure that the studies and design to be performed by the TJPA meet the highest standards of quality as well as the project needs. The experts will also make available their resources to provide recommendations, concepts and ideas for the consideration of the TJPA.
	•	TOTAL	\$	5,664,675	

<sup>&</sup>lt;sup>1</sup> See Attachment 1 for footnotes.

Attachment 3: Proposed Staff Recommendations - (Note this is an information item for the 03.21.17 Board Meeting) <sup>1</sup>

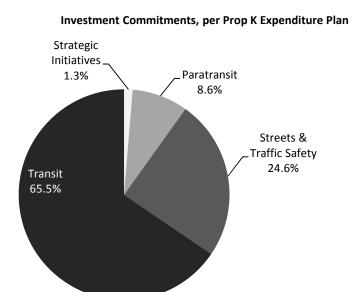
EP Line No./ Category	Project Sponsor	Project Name	Prop K Funds Recommended	Recommendation
5	ТЈРА	Downtown Extension - Preliminary Engineering	\$ 4,549,675	<ul> <li>Special Conditions: 1.) Requires the TJPA to agree to the attached oversight protocol for Phases 1 and 2. TJPA has agreed to the oversight protocol, which is already being implemented.</li> <li>2.) If the SFCTA Board acts to endorse an alternate alignment for the DTX, the SFCTA reserves the right to pause the work funded by the current request in order to meet with TJPA, the Planning Department and the Mayor's Office to discuss any needed modifications to the scope, including potentially ceasing work on certain elements.</li> <li>3.) Strategic Plan Amendment: The recommended allocation is contingent upon a Prop K Strategic Plan amendment to the Caltrain Downtown Extension (DTX) to a Rebuilt Transbay Terminal Expenditure Plan line item. The amendment would advance \$3,040,777 programmed for the DTX in FY 2033/34. Further, the recommended action requires an exception to the Strategic Plan policy that sets aside all remaining funds not already programmed to Phase 1 for Phase 2 construction.</li> </ul>
5	ТЈРА	Downtown Extension - Tunnel Engineering Options Study	\$ 915,000	<b>Special Conditions:</b> 1) The recommended action requires an exception to the Strategic Plan policy that sets aside all remaining funds not already programmed to Phase 1 for Phase 2 construction. The recommendation also includes Special Conditions 1) and 2) listed above for the DTX - Preliminary Engineering request, above.
5	ТЈРА	Downtown Extension - Additional Oversight/ Peer Review	\$ 200,000	Special Condition: Same as 1) above for the Tunnel Enginerring Options Study.
		TOTAL	\$ 5,664,675	

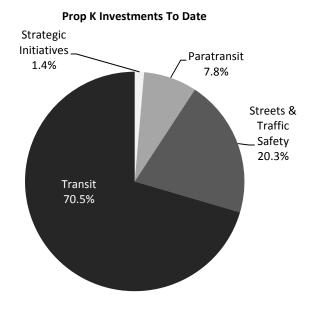
<sup>&</sup>lt;sup>1</sup> See Attachment 1 for footnotes.

# Attachment 4. Prop K Allocation Summary - FY 2016/17

PROP K SALES TAX												
											CA	SH FLOW
	Total		F	FY 2016/17	]	FY 2017/18	]	FY 2018/19	F	Y 2019/20		FY 2020/21
Prior Allocations	\$	127,757,542	\$	44,518,051	\$	58,318,570	\$	24,092,816	\$	671,807	\$	156,298
Current Request(s)	\$	5,664,675	\$	3,744,805	\$	1,919,870	\$	_	\$	-	\$	-
New Total Allocations	\$	133,422,217	\$	48,262,856	\$	60,238,440	\$	24,092,816	\$	671,807	\$	156,298

The above table shows maximum annual cash flow for all FY 2016/17 allocations approved to date, along with the current recommended





# Attachment 5 Adopted and Proposed Amended Strategic Plan Pending April 2017 Board Action

EP No.	EP Line Item	Total Available Funds	Percent of Available Funds Spent on Financing	Total 30-year Programming & Finance Costs	FY2015/16	FY2016/17	FY2017/18	FY2018/19	FY2019/20	FY2020/21	FY2021/22	FY2022/23
	014 Prop K Strategic Plan - t_6 (Approved)											
5	Downtown Extension to a Rebuilt Transbay Terminal	\$ 298,754,023	8.65%	Programming         \$ 223,176,074           Finance Costs         \$ 25,846,745           Total         \$ 249,022,819	\$ 13,215,624 \$ 215,009 \$ 13,430,633	\$ 716,295	\$ - \$ 2,638,314 \$ 2,638,314	\$ - \$ \$ 1,915,247 \$ \$ 1,915,247 \$	1,579,406	\$ - \$ 3,187,017 \$ 3,187,017		
TOTAL				Programming \$ 223,176,074 Finance Costs \$ 25,846,745 Total \$ 249,022,819	\$ 13,215,624 \$ 215,009 \$ 13,430,633	\$ 716,295	\$ 2,638,314		1,579,406	\$ 3,187,017	\$ 2,752,375	
	014 Prop K Strategic Plan - t 7 (Current Request)											
5	Downtown Extension to a Rebuilt Transbay Terminal	\$ 298,752,463	9.15%	Programming         \$ 223,176,074           Finance Costs         \$ 27,331,130           Total         \$ 250,507,204	\$ 11,935,674 \$ 211,404 \$ 12,147,078	\$ 734,924	\$ - \$ 2,714,019 \$ 2,714,019	\$ - \$ \$ 1,972,767 \$ \$ 1,972,767 \$		\$ - \$ 3,327,610 \$ 3,327,610	\$ 2,890,979	\$ 2,607,186 \$ 2,607,186
TOTAL				Programming Finance Costs Total	\$ 11,935,674 \$ 211,404 \$ 12,147,078	\$ 734,924	\$ 2,714,019	\$ 1,972,767 \$	1,631,633	\$ 3,327,610		\$ 2,607,18
Change				_	_	·			·			
5	Downtown Extension to a Rebuilt Transbay Terminal	\$ (1,560)	0.5%	Programming \$ 1,484,385 Total \$ 1,484,385	\$ (1,279,950) \$ (3,604) \$ (1,283,554)	\$ 18,629	\$ 75,705	\$ 57,520 \$	52,227	\$ 140,593	\$ 138,604	\$ 144,75
Prop K Tota												
	)14 Prop K Strategic Plan - t 6 (Approved)											
	Prop K	\$ 2,922,183,419	8.49%	Programming \$ 2,536,973,769 Finance Costs \$ 248,179,108 Total \$ 2,785,152,877								
	014 Prop K Strategic Plan - t 7 (Current Request)											
	Ргор К	\$ 2,922,169,485	8.55%	Programming \$ 2,536,973,769 Finance Costs \$ 249,724,546 Total \$ 2,786,698,315								
Change												
	Prop K	\$ (13,934)	0.1%	Programming \$ - Finance Costs \$ 1,545,438 Total \$ 1,545,438								

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# Attachment 5 Adopted and Proposed Amended Strategic Plan Pending April 2017 Board Action

EP No.	EP Line Item	FY2023/24		FY2024/25		FY2025/26	Fì	Y2026/27		FY2027/28		FY2028/29		FY2029/30		FY2030/31		FY2031/32		FY2032/33		FY2033/34
	014 Prop K Strategic Plan - t 6 (Approved)																					
_	Downtown Extension to a Rebuilt	\$	- !	•	\$	-	\$	-	\$	-	\$	-	\$	-	\$	-	\$	-	\$	-	\$	30,161,173
5	Transbay Terminal	\$ 1,985,0 \$ 1,985,0		.,,,,	\$	1,150,578		853,248 853,248		434,241 434,241			\$	-	\$		\$		\$	-	\$	30,161,173
		\$ 1,765,0	004   1	1,320,330	Φ	1,130,370	ş	033,240	ð	434,241	Ψ	-	Þ		J		J		φ	-	1.0	30,101,173
		\$	-	-	\$		\$		\$		\$		\$		\$		\$		\$		\$	30,161,173
TOTAL			084			1,150,578		853,248		434,241			\$		\$		\$		\$		\$	
		\$ 1,985,0	084 \$	1,520,338	\$	1,150,578	\$	853,248	\$	434,241	\$	-	\$	•	\$	-	\$	•	\$	-	\$	30,161,173
	014 Prop K Strategic Plan - t 7 (Current Request)																					
	Downtown Extension to a Rebuilt	\$	- 5	-	\$	-	\$	-	\$	-	\$	-	\$	-	\$	-	\$	-	\$	-	\$	27,120,396
5	Transbay Terminal	\$ 2,126,4			\$	1,287,194	\$		\$	598,458			\$	-	\$	-	\$	-	\$	-	\$	
		\$ 2,126,4	488 5	\$ 1,655,290	\$	1,287,194	\$	1,011,191	\$	598,458	\$	124,821	\$	-	\$	-	\$	-	\$	-	\$	27,120,396
		\$	-	-	\$	-	\$	-	\$	-	\$	-	\$		\$	-	\$	-	\$	-	\$	27,120,396
TOTAL		\$ 2,126,4	488 5	1,655,290	\$	1,287,194	\$	1,011,191	\$	598,458	\$	124,821	\$		\$		\$		\$		\$	
		\$ 2,126,4	488 \$	1,655,290	\$	1,287,194	\$	1,011,191	\$	598,458	\$	124,821	\$		\$	-	\$		\$	-	\$	27,120,396
Change																						
_	Downtown Extension to a Rebuilt	•	-		\$		\$		\$		\$		\$		\$		\$		\$		\$	(3,040,777)
5	Transbay Terminal		403 S			136,616 136,616		157,943 157,943		164,218 164,218		124,821 124,821			\$		\$ \$		\$ \$		\$	(3,040,777)

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#### Attachment 6

# San Francisco County Transportation Authority Prop K/Prop AA Allocation Request Form

FY of Allocation Action: 2016/17

Project Name: Downtown Extension - Preliminary Engineering

Grant Recipient: Transbay Joint Powers Authority

EXPENDITURE PLAN INFORMATION

Prop K EP category: Caltrain Downtown Extension to a Rebuilt Transbay Terminal: (EP-5)

Prop AA Category:

Current Prop K Request: \$

Current Prop AA Request: \$ -

Supervisorial District(s): District 06

Prop K EP Line Number (Primary): 5

Prop K Other EP Line Numbers:

## **REQUEST**

# **Brief Project Description (type below)**

Phase 2 of the Transbay Transit Center Program is a 1.3-mile Downtown Rail Extension (DTX) tunnel that extends Caltrain commuter rail from its current terminus at Fourth and King streets to the new Transbay Transit Center (TTC). It also completes the build-out of the below-grade train facilities at the TTC, a new underground station along the DTX alignment, an intercity bus facility, and provides the tracks and northern terminus for California's future High-Speed Rail system.

# Detailed Scope, Project Benefits and Community Outreach (type below)

Following on the SEIR/SEIS, the TJPA wishes to continue preliminary engineering of the DTX. In response to feedback provided by the SFCTA Board, the current request will bring design of the DTX to 30% for new elements and modified elements that are common to all alignments being evaluated in the Planning Department's Railyard Alternatives and I-280 Boulevard Feasibility Study. The work is scheduled to be complete by December 2017. See attached Word document for details.

# Project Location (type below)

First & Mission Streets, San Francisco, CA

# Project Phase (select dropdown below)

Design Engineering (PS&E)

Map or Drawings Attached? Yes
Other Items Attached? Yes

4,549,675

SYPP/STRATEGIC PLAN INFOR		<b>u</b>			
Type of Project in the Prop K 5YPP/Prop AA Strategic Plan?	Named Pr	oject			
Is the requested amount greater than the amount programmed in the relevant 5YPP or Strategic Plan?	Greater th	an Program	med Amount		
Prop K SP/5YPP Amount:	\$	2,623,898	Prop AA Strategic Plan Amount:		

# Please describe and justify the necessary amendment:

The Prop K Strategic Plan amendment to the Caltrain Downtown Extension (DTX) to a Rebuilt Transbay Terminal category would advance \$2,840,777 programmed for DTX in FY 2033/34. The Strategic Plan establishes a policy requiring all remaining funds not currently programmed to Phase 1 to be spent on construction of Phase 2 (DTX) to reinforce the need to complete the DTX as soon as possible and to avoid using all of the Prop K funds on Phase 1. SFCTA staff supports the recommended request, which requires an exception to this policy, now that Phase 1 is fully funded and appears on track to be delivered within the revised budget. Further, the proposed scope will support TJPA's efforts to advance design and develop a solid cost estimate, both of which will facilitate TJPA's ability to secure funding for DTX.

# **Background and Project Benefits**

The Transbay Transit Center Program (Program) is an approximately \$6 billion program to replace the former Transbay Terminal at First and Mission streets in downtown San Francisco with a modern regional transit hub that will connect eight Bay Area counties and the State of California through eleven transit systems including Caltrain commuter rail and the future California High-Speed Rail system from San Francisco to Los Angeles.

The Program is being constructed in two phases. Phase 1 includes design and construction of the above-grade portion of the Transit Center, the core and shell of the two below-grade levels of the train station, a new bus ramp, a bus storage facility, and a temporary bus terminal. Phase 2 will complete the build-out of the below-grade train station facilities at the Transit Center and build the Downtown Rail Extension (DTX) tunnel, a new underground station along the DTX alignment, and an intercity bus facility.

Phase 2 will provide the following public benefits:

- Improve access to rail services and enhance San Francisco's accessibility to a local and regional workforce
- Enhance connectivity between Caltrain and other major transit services
- Create the northern terminus for the state's future high-speed rail system
- Build a new intercity bus station next to the Transit Center for Greyhound, Amtrak and other regional bus service providers
- Contribute to improved regional air quality by attracting thousands of new transit riders and reducing the number of vehicles on Highways 101 and 280

# **Current Request**

Preliminary engineering (PE) (30% design level) for many components of Phase 2, including the Fourth and Townsend Street Station, was completed in July 2010. Subsequently, as a result of new requirements by the California High-Speed Rail Authority (CHSRA), as well as other factors, elements have been modified or added to Phase 2. These additions and modifications are included in a draft Supplemental Environmental Impact Statement/Environmental Impact Report (SEIS/EIR) released in December 2015 for public comment. Further design work on these new or modified elements as outlined below will be required to return the full DTX design and bring all Phase 2 elements to the 30% PE level. At the TJPA's June 2016 Board of Directors meeting, the Board directed TJPA staff to move forward with the following next steps in support of Phase 2:

- Complete 30% PE drawings
- Update right-of-way estimate
- Update ridership study
- Perform risk assessment
- Peer review funding plan
- Update Program cost estimate
- Peer review 2016 cost estimate

- Complete development of funding plan
- Select delivery method
- Update budget
- Continue coordination with the City on the Railyard Alternatives and I-280 Boulevard Feasibility Study, Caltrain and CHSRA

The current request would partially fund preliminary engineering, program management/program controls, financial and right-of-way consultants, and a TJPA staff person for these next steps for Phase 2, as described in detail below. This scope only includes elements that are common to all alignments being evaluated in the Planning Department's Railyard Alternatives and I-280 Boulevard Study (RAB).

# **Preliminary Engineering (PE)**

Parsons Transportation Group

The Downtown Extension designer, Parsons Transportation Group, will continue preliminary engineering (PE) advancing work toward the full 30% level. This contract was renewed by the TJPA Board in 2014. This request is for \$3,063,153. Tasks will include the following:

# A. Project Management

- 1. Submission of monthly status report with each monthly invoice, indicating work performed on each of the approved tasks for which payment in being requested
- 2. Project meetings (e.g., TJPA staff or Board meetings)
- 3. Scheduling
- 4. Quality Control and Quality Assurance
- 5. Other Direct Costs as requested and/or agreed by TJPA
- B. Coordination with Transbay Transit Center (TTC) Designers and Train Operators
  - 1. Continue ongoing coordination with train operators:
    - a. Provide coordination with CHSRA and Caltrain including:
      - i. Coordination on operator criteria and programmatic requirements
  - 2. Continue ongoing coordination with other TTC team members including:
    - a. Coordination of Phase 2 train systems provisions
    - b. Coordination of DTX/TTC structural interface
    - c. Other as-needed coordination
  - 3. Additional as-needed work could include:
    - a. Coordination meetings between project teams
    - b. Train operations planning, simulations and reviews
    - c. Analysis of Caltrain and CHSRA rolling stock impact to planned DTX infrastructure, including station platforms and clearances

- d. Identification of recommended revisions for criteria including but not limited to applicable code updates, vehicle dynamic envelope and fire-life safety
- e. Review and comment on design criteria changes with respect to project design, construction cost and schedule implications
- 4. Assistance to TJPA with financing alternatives including:
  - a. Performing additional estimates
  - b. Meeting with potential financing partners
  - c. Evaluation of feasibility of financing options
- C. Federal Transit Administration (FTA), Federal Railroad Administration (FRA), Bay Area Rapid Transit (BART), California Public Utilities Commission (CPUC), Other Utilities, & SEIS/EIR Study Coordination
  - 1. As-needed SEIS/EIR coordination with FTA and FRA
  - 2. Coordinate with BART on the BART/Muni Pedestrian Connector
  - 3. Coordinate with private utilities as necessary
- D. Other Coordination with City and County of San Francisco (City)
  - Continue ongoing coordination with the City Planning Department regarding accommodating proposed joint development at emergency ventilation/exit facility site on Second and Harrison streets
  - 2. Continue ongoing coordination with San Francisco Public Utilities Commission (SFPUC) for interface with new major SFPUC facilities in project area
  - 3. Coordinate reviews of DTX fire-life safety planning with San Francisco Fire Department and, if necessary, the State Fire Marshal
  - 4. Coordination with other City agencies, as needed

## E. Right-of-Way Support

- 1. Continue ongoing coordination with adjacent property developments and, if necessary, the City Department of Building Inspection to protect DTX from adverse impacts along its Second Street alignment
- 2. Continue ongoing coordination and engineering support for DTX right-of-way along Second Street: Provide engineering support including structural engineering studies and cost estimates in support of TJPA property acquisition activities, including:
  - a. Preparation of a conceptual design technical memorandum on underpinning constructability
  - b. Preparation of geotechnical baseline memoranda
  - c. Preparation of PE underpinning design plans
- F. Preliminary Engineering Design Work and Updates for DTX

As noted above, some elements of the Phase 2 design were previously at the 30% design level. Elements below that include an asterisk (\*) are elements that have been modified since 2010 and that require updating to reach the 30% design level. Elements with a double asterisk (\*\*) are new scope items, or items that were deferred in 2010, that require

a greater design effort to achieve the 30% design level. This scope only includes elements that are common to all alignments being evaluated in the Planning Department's RAB Study.

- 1. \*\* Civil Streetwork
  - a. Prepare technical memoranda on the City's street improvement plans on Second Street
  - b. Prepare PE streetwork plans
- 2. \* Civil Utilities
  - a. Protection planning for AT&T manholes
  - b. Prepare technical memoranda to support PE cost estimate update for non-Townsend Street elements
  - c. Support advance utility relocation package scoping for non-Townsend Street elements
  - d. Update PE utility relocation plans for non-Townsend Street elements
  - e. Define temporary utility relocations for non-Townsend Street elements
- 3. \*\* Civil Traffic
  - a. As-needed traffic engineering support of TJPA coordination with the City
  - b. Prepare Traffic Management Plan for non-Townsend Street element
- 4. \* Track Configuration
  - a. Update PE plans and profile reference files, as needed
  - b. Update DTX crossover arrangements
  - c. Complete PE plan and profile including precise alignment control tables
- 5. \* Structural Throat Cut-and-Cover
  - a. Prepare conceptual level details for the TTC interface and update typical sections in the PE plans
  - b. Prepare technical memoranda and concept for support-in-place of major utilities
  - c. Complete details to PE level
- 6. \*\* Ventilation/Emergency Exit Structures
  - a. Prepare technical memoranda to support taller superstructure at Second and Harrison site
  - b. Update structural and architectural PE plans for Second and Harrison site
- 7. \*\* Fire-Life Safety (FLS)
  - a. Update mechanical PE design plans for Second and Harrison ventilation/ emergency exiting structure
  - b. Prepare technical memoranda on water/air mechanical systems to support the PE cost estimate update
- 8. \* Systems Tunnel Electrical
  - a. Prepare technical memoranda to support PE cost estimate update
- 9. \* Systems Overhead Catenary Systems (OCS)
  - a. Prepare technical memoranda to support PE cost estimate update
  - b. Complete PE design of TTC OCS
- 10. \*\* Systems Signals
  - a. Update PE Phase 1 Conceptual Engineering single line schematic plans

- b. Coordinate latest signal equipment space provisions with tunnel design
- c. Prepare technical memoranda to support PE cost estimate update
- 11. \*\* Systems Communications
  - a. Prepare technical memoranda to support PE cost estimate update
  - b. Coordinate with Phase 2 planning
- 12. Preliminary Engineering Report
  - a. Update PE report and summarize technical memoranda for non-Townsend Street elements
- G. Conceptual Engineering Design Work for BART/Muni Pedestrian Connector
  - 1. Prepare conceptual design memoranda to support cost estimate
  - 2. Prepare technical memoranda on streetwork, utilities, traffic, structural design, architectural design, and FLS to support cost estimate
  - 3. Prepare conceptual design plans of cut-and-cover structure and interface structure
  - 4. Prepare conceptual street reconstruction, utility relocation, structural (cut-and-cover and interface structure), and architectural (Connector, receiving structures, and mid-block emergency egress structure including electrical and lighting plans) plans
  - 5. Develop Traffic Management Plan
  - 6. Prepare geotechnical baseline memoranda
  - 7. Prepare programming document
  - 8. Perform code analysis
  - 9. Develop FLS and exiting strategy
  - 10. Perform pedestrian flow/exit analysis
  - 11. Perform CFD and SES FLS modeling
  - 12. Prepare Conceptual Engineering Report
    - a. Summarize technical memoranda in a report
- H. DTX Preliminary Engineering Cost Estimate Update for Non-Townsend Street Elements
  - 1. Update the DTX cost estimate for non-Townsend Street elements based on the rate refresh update prepared in June 2016 and new quantities based on new engineering, including BART/Muni Pedestrian Connector conceptual design

#### **Exclusions:**

- 1. Final Design
- 2. Technical Specifications
- 3. Design-Build Contract Documents (in the event that Design-Build is the chosen delivery method)

# **Program Management/Program Controls (PMPC)**

AECOM (URS)

The PMPC provides a variety of services and reports to augment TJPA staff in implementing the Transbay Transit Center Program. Specific tasks include program management services, program implementation and support, program controls management, quality assurance and control implementation, risk management program implementation, document control, administrative support, and project management for Phases 1 and 2 of the Program. The contract was awarded in 2013. This funding request is for **\$698,500** for the following tasks (total estimated cost \$1,130,000, but \$431,500 remains in Prop K Resolution 15-01):

# A. Phase 2 Program Management

- 1. Program Management
  - a. Project meetings
  - b. Project controls support, including an update to the Phase 2 Budget
  - c. Program coordination support
  - d. Utility coordination support
- 2. DTX Project Management
  - a. Contribute to monthly PMPC status reports
  - b. Project meetings
  - c. Work with estimators, technical specialists and Program Controls Manager to validate scope and develop the project budget and schedule for Phase 2, including subprojects and project components. Maintain current and accurate information regarding project scope, schedule and budget
  - d. Maintain an issue-action tracking system to facilitate timely decision-making
  - e. Manage the DTX design consultant including, but not limited to, invoice reviews, submittal reviews, contract negotiations, coordination with TTC design consultant, and correspondence on technical project issues
  - f. Refine and validate design constraints, criteria, and standards with the engineering design team as requested by TJPA. Complete, maintain and update design criteria as necessary
  - g. Provide technical, project-specific assistance to TJPA, including preparation of letters and presentations
  - h. Provide support for supplemental environmental studies
  - i. Coordinate with train operators and outside agencies (i.e., SFPUC for sewer interfaces, SFMTA for Central Subway interface, City Planning and Office of Community Investment and Infrastructure for potential joint development parcels and the RAB Study, BART for BART/Muni Pedestrian Connector)
  - j. Coordinate with adjacent properties along the alignment to determine potential impacts to DTX and/or the properties
  - k. Manage interfaces between Phase 2 components and other component projects of the Program

- 3. Document Management and Administrative Support
  - a. Record keeping and submittal logging
  - b. Document retrieval and issuance to support project or outside agency requests
  - c. Technical and editorial reviews of project documents, letters, and presentations
- B. Ridership Study (by Cambridge)
  - a. Update the 2008 Cambridge Systematics ridership estimates
- C. Update Phase 2 cost estimate (with TBD Consultants)
- D. Advise on and assist TJPA in selection of delivery method (with AECOM)

# Right-of-Way

Tim Runde

The purpose of the right of way acquisition cost estimate is to assist the TJPA in developing an updated budget for the Downtown Extension (DTX). The scope of work includes providing estimates (based on the current market) to purchase all properties listed below that are identified for full or partial take. The TJPA will update the estimates at the time of acquisition. The scope also includes providing estimates for properties that require either easements and/or vacancy during construction, as described below.

# **Full Take (Red Properties)**

- 181 Second Street
- 191 Second Street/594 Howard Street
- 201 Second Street
- 205-215 Second Street
- 217 Second Street
- 580 Howard Street
- 180 Townsend Street
- 689-699 Third Street

## **Partial Take (Orange Properties)**

- 201 Mission Street
  - The valuation is of the land shown in Orange on the exhibit and the podium building.
  - o The valuation should assume that the TJPA will be required to acquire the CMS strip which now connects the parking lot at 201 Mission to Howard Street and grant the fee to Parcel M3 to the owner at fair market value to replace existing parking on the CMS Strip and the midblock area. Accordingly, the scope of work includes an estimate of the value of Parcel M3, which value would be offset against the compensation to the owner, and an estimate of the value of the CMS Strip.
  - o Please note that TJPA will engage the DTX designer Parsons to assess the cost of (a) demolition of the podium offices at 201 Mission, (b) the underpinning of the

201 Mission Tower, if any, (c) restoration of the façade/curtain wall of the 201 Mission Tower after removal of the podium, and (d) relocation of the loading dock and trash compactor to the east side of the 201 Mission Tower to be accessed from Main Street across Parcel M3, and (e) physical relocation of the cogeneration plant. Parsons will assume that the TJPA will grant an easement to the owner somewhere on Block 3718 for relocation of the owner's cogeneration plant. Accordingly, this scope of work includes providing an estimate of the cost to the TJPA to grant an easement for the cogeneration plant. The construction costs (a) – (e) will be part of the TJPA's construction budget rather than the ROW acquisition budget and are not included in this scope of work.

#### • 30 Beale Street

The scope of work includes investigating with the Planning Department whether the open space that would be eliminated by locating the emergency exit for the BART tunnel in the plaza of the buildings at the NE corner of Beale and Mission would require the owner of that project to replace the lost open space under its conditional use/309 permit and, if the open space must be replaced, the estimate should be equivalent to the cost to replace it and the impact on value of the plaza if the emergency exit is located in the middle of the plaza.

# **Vacate/Subsurface Easement (Blue Properties)**

## • 235 Second Street

- This scope of work includes providing an estimate of lost rent during the TJPA's construction (assume a 7 year construction period). The valuation estimate should be based on the assumption that the landlord will receive no rent for the portion of the building demolished and that the rent for the portions of the building that can be occupied during construction of the throat structure would be reduced due to impaired access from Second Street and construction noise, vibrations, and dust.
- o This scope of work includes valuation of a permanent construction easement for the throat structure running under this property.
- o The front of the building will need to be demolished for construction of the throat structure, the building underpinned, the façade/curtain wall and front entrance temporarily reconstructed during the TJPA's construction, and a permanent façade/curtain wall and front entrance reconstructed following the completion of the TJPA's work. These costs will be part of the TJPA's construction budget rather than the ROW acquisition budget and are <u>not</u> included in this scope of work.

#### • 589 Howard Street

- The building cannot be occupied during construction. This scope of work includes providing an estimate of lost rent during the TJPA's construction. The valuation estimate should be based on the assumption that the landlord will receive no rent from the building during construction of the throat structure.
- o This scope of work includes valuation of a permanent easement for the throat structure running under this property.

O The construction of the throat structure will require that the front entrance to the building be closed and the front of the building underpinned. These costs will be part of the TJPA's construction budget rather than the ROW acquisition budget and are <u>not</u> included in this scope of work.

# • 165-171 Second Street

- o This scope of work includes lost rent during the TJPA's construction. The valuation estimate should be based on evidence that the owner will suffer lost rent if the building either cannot be occupied in whole or in part during construction, or tenants require a reduction in rent due to construction noise, vibrations, and dust. The TJPA shall instruct the valuation expert when the scope of the TJPA's work on this property is ascertained.
- This scope of work *may* include valuation of a permanent easement for underpinning and/or the throat structure running under this property.
- O The construction of the throat structure will require that the southeast corner of the building be underpinned. The cost of underpinning will be part of the TJPA's construction budget rather than the ROW acquisition budget and is <u>not</u> included in this scope of work.

# **Easement Subsurface (Yellow Properties)**

- 301 Brannan Street
- 634 Second Street
- 634-636 Second Street
- 640 Second Street
- 650 Second Street
- 678 Second Street
- 680 Second Street
- 130 Townsend Street
- 136 Townsend Street
- 144-146 Townsend Street
- 148-154 Townsend Street
- 164 Townsend Street
- 166-178 Townsend Street
  - o This scope of work includes providing an estimate for a permanent tunnel easement under these properties.
  - O This scope of work includes estimating the loss of use and/or value of these properties, if any, due to noise and vibrations that occupants of those buildings will feel (a) during the borings for the underground train tunnel, (b) during permanent train operations in the completed tunnel. A loss in use or value could result from interference with sleep and other activities in the residential buildings and with business operations in the restaurants and offices (exclude impact on occupants of light industrial buildings, which should be negligible) during the

TJPA's construction and from permanent train operations. TJPA will engage Parsons to quantify the vibrations and noise.

. Estimated cost: **\$120,000** 

# **Phase 2 Funding Plan**

Sperry Capital

TJPA's financial consultants will assist TJPA staff in completing development of the Phase 2 funding plan. In view of the federal funding uncertainties related to the current administration, the project team will revisit alternative project delivery methods, including P3, to determine which provide the best funding opportunities. Estimated cost: \$150,000

## **Phase 2 TJPA Staff**

TJPA plans to hire one full-time staff person to manage Phase 2 work efforts. This would be a program manager level position, with a salary range of \$204,360 to \$257,920. TJPA's benefit rate is approximate 35% of salary. Estimated cost: \$224,016 salary plus \$78,406 benefits = \$302,422

Project Name: Downtown Extension - Preliminary Engineering

# **ENVIRONMENTAL CLEARANCE**

**Environmental Type**: EIR/EIS

## **PROJECT DELIVERY MILESTONES**

Enter dates below for ALL project phases, not just for the current request, based on the best information available. For PLANNING requests, please only enter the schedule information for the PLANNING phase.

Phase	Si	tart	End			
Filase	Quarter	Calendar Year	Quarter	Calendar Year		
Planning/Conceptual Engineering (PLAN)		1995		2001		
Environmental Studies (PA&ED)		2001	Oct-Dec	2016		
Right-of-Way	Jul-Sep	2004	Oct-Dec	2019		
Design Engineering (PS&E)	Jan-Mar	2005	Jul-Sep	2019		
Advertise Construction	Jul-Sep	2018				
Start Construction (e.g. Award Contract)	Oct-Dec	2018				
Operations (i.e., paratransit)						
Open for Use			Oct-Dec	2025		
Project Completion (means last eligible expenditure)			Oct-Dec	2025		

## **SCHEDULE DETAILS**

Provide dates for any COMMUNITY OUTREACH planned during the requested phase(s). Identify PROJECT COORDINATION with other projects in the area (e.g. paving, MUNI Forward) and relevant milestone dates (e.g. design needs to be done by DATE to meet paving schedule). List any timely use-of-funds deadlines (e.g. federal obligation deadline). If a project is comprised of MULTIPLE SUB-PROJECTS, provide milestones for each sub-project. For PLANNING EFFORTS, provide start/end dates for each task.

The schedule presented above is based on the Phase 2 schedule presented to the TJPA Board of Directors in June 2016, at which the Board provided direction to complete Phase 2 preliminary engineering. This request advances preliminary engineering, but does not complete it.

Project Name: Downtown Extension - Preliminary Engineering

## **FUNDING PLAN - FOR CURRENT REQUEST**

Enter the funding plan for the phase(s) that are the subject of the CURRENT REQUEST. Totals should match those shown in the Cost Summary below.

Fund Source	Planned	Pr	ogrammed	A	Allocated	Total
Prop K	\$ 1,925,778	\$	2,623,898	\$	-	\$ 4,549,675
Prop AA	\$ -	\$	-	\$	-	\$ -
	\$ -	\$	-	\$	-	\$ -
Total:	\$ 1,925,778	\$	2,623,898	\$	-	\$ 4,549,675

#### **FUNDING PLAN - FOR ENTIRE PROJECT (ALL PHASES)**

Enter the funding plan for all phases (planning through construction) of the project. This section may be left blank if the current request covers all project phases. Totals should match those shown in the Cost Summary below.

Fund Source	Plai	nned	Progr	ammed	Allo	cated	Total
Prop K	\$						\$ -
Prop AA	\$	Se	e attach	ed		-	\$ -
	\$	-	1 \$	277	\$	_	\$ -
Total:	\$	-	\$	-	\$	-	\$ -

## **COST SUMMARY**

Show total cost for ALL project phases (in year of expenditure dollars) based on best available information. Source of cost estimate (e.g. 35% design, vendor quote) is intended to help gauge the quality of the cost estimate, which should improve in reliability the farther along a project is in its development.

Phase	Total Cost	Prop K - Current Request	Prop AA - Current Request	Source of Cost Estimate
Planning/Conceptual Engineering (PLAN)	\$ 1	\$ 1		Completed by Caltrain
Environmental Studies (PA&ED)	\$ 34,184,166	\$ 1		Included in 2016 Phase 2 Cost Estimate (Programwide)
Right-of-Way	\$ 266,200,000	\$ 1		2016 Phase 2 cost estimate
Design Engineering (PS&E)	\$ 130,297,416	\$ 4,549,675	\$ -	TJPA Approved Budget for Phase 2
Construction (CON)	\$ 3,504,369,982	\$ -	\$ -	2016 Phase 2 cost estimate - see attached detailed estimate
Operations				
(Paratransit)	\$ -	\$ -		
Total:	\$ 3,935,051,564	\$ 4,549,675	\$ -	

% Complete of Design: 58% as of 5/31/2016
Expected Useful Life: 70 Years

# PROPOSED REIMBURSEMENT SCHEDULE FOR CURRENT REQUEST (instructions as noted below)

Use the table below to enter the proposed reimbursement schedule for the current request. Prop K and Prop AA policy assume these funds will not be reimbursed at a rate greater than their proportional share of the funding plan for the relevant phase unless justification is provided for a more aggressive reimbursement rate. If the current request is for multiple phases, please provide separate reimbursement schedules by phase. If the proposed schedule exceeds the years available, please attach a file with the requested information.

Fund Source	FY	2016/17	É	Y 2017/18	FY	2018/19	FY	2019/20	FY	2020/21+	Total
Prop K	\$	2,729,805	\$	1,819,870	\$	-	\$	-	\$	-	\$ 4,549,675
Prop AA	\$	-	\$	-	\$	-	\$	-	\$	-	\$ -

# **General Instructions**

- Sponsor may attach budget details in sponsor agency format (Excel), which includes all required information (per phase) detailed below.
- Contingencies should be called out in each phase.

# For Design Engineering Phase:

Project Name: Downtown Extension - Preliminary Engineering

# PROJECT BUDGET - PRELIMINARY ENGINEERING

BUDGET SUMMARY				
Agency/Consultant	Total	% of Total		
Parsons (Designer)	\$ 3,063,153	92.3%		
AECOM (PMPC)	\$ 698,500	15.4%		
Financial Consultant	\$ 150,000	3.3%		
ROW Consultant	120,000	2.6%		
TJPA Staff	\$ 302,422	%9.9		
Contingency	\$ 215,600	4.7%		
Total	\$ 4,549,675	100.0%		

	Total	302,422	302,422
	D.	₩	\$
	FTE	~	1
	Fully Burdened Hourly Cost	\$ 145.40	\$ 145
	Overhead Multiplier	\$ 1.35 \$	1 8
<b>~</b>	Base Hourly Rate	\$ 107.70	\$ 108   \$
ATE - BY AGENCY	Hours	2,080 \$	2,080   \$
DETAILED LABOR COST ESTIMA	ТЈРА	Senior Design & Enginneering Manager (Ph II)	Total

2016 Phase 2 Cost Estimate (in year of expenditure dollars)

		Direct Costs	Design Contingency	Total Cost
DTX				S1 4/2 222 000
DIX	Samuel 10 Family and View Santas Station and Vand Ulanda	***		\$1,467,777,900
	Segment 10 Fourth and King Surface Station and Yard Upgrade	\$0		\$0
_	Segment 9 At Grade Trackway	\$707,000		\$707,000
	Segment 8 U-Wall Segment	\$57,906,000		\$57,906,000
	Segment 7 Cut and Cover West of Fifth St	\$92,220,000		\$92,220,000
	Segment 6 Cut and Cover Fourth & Townsend Underground Station	\$123,721,000		\$123,721,000
	Segment 5 Cut and Cover East of Fourth St	\$82,069,000		\$82,069,000
	Segment 4 NATM Mined Tunnel	\$387,981,000		\$387,981,000
	Segment 3 Cut and Cover Throat Structure	\$151,037,000		\$151,037,000
	Segment 2 Transit Center Trackworks	\$889,000		\$889,000
		\$82,775,000		\$82,775,000
	Systems	\$92,662,000		\$92,662,000
	Allowances	\$90,162,000		\$90,162,000
	Design Contingency		\$199,551,900	\$199,551,900
	nce for Properties Demolition	\$3,000,000		\$3,000,000
Tunnel :	Stub Box	\$99,876,000	included	\$99,876,000
DTX V	ent Structures (heighting of structures)	\$3,222,000	included	\$3,222,000
Transit	Center Building (TCB)			\$247,203,907
	Transit Center Fit Out	\$150,255,780	\$7,512,576	\$157,768,356
	Allowance for RVA for above at 5%	\$7,512,789		\$7,512,789
	Train Box Extension	\$55,631,840	\$2,782,176	\$58,414,016
	Allowance for RVA for above at 5%	\$2,781,592	\$514,738	\$3,296,330
IBF - Po	CPA 95% CD Estimate item 2.3 plus 16.8% for escalation to 2016	\$12,582,864	\$629,552	\$13,212,416
	nce for IBF Escalator and Elevator from Beale street to Below rain Box	\$5,000,000		\$5,000,000
Allowar	nce for Main Street Utility Relocation	\$2,000,000		\$2,000,000
	Subtotal DTX and TCB Construction excluding escalation	\$1,503,991,865	\$210,990,942	\$1,714,981,807
DTX an	d TCB Construction Escalation at 5% to mid construction (2023)			\$583,257,836
	Subtotal DTX and TCB Construction including escalation			\$2,298,239,643
ROW**	•			\$266,200,000
Program	nwide @ 22.5% of above excluding ROW			\$517,103,920
_	Subtotal Program Costs			\$3,081,543,562
Constru	ction Contingency @ 10%			\$229,823,964
	m Reserve @ 15% of Subtotal Program Costs			\$462,231,534
	Total Program Cost excluding BART/Muni Pedestrian Connector			\$3,773,599,061
BART/	Muni Pedestrian Connector - Direct Construction Cost	\$109,525,767	included	\$109,525,767
	Muni Pedestrian Connector - Escalation			\$37,249,236
	Muni Pedestrian Connector - Construction Contingency			\$14,677,500
	BART/Muni Pedestrian Connector Total Cost			\$161,452,503
	Total Program Cost including BART/Muni Pedestrian Connector	\$1,613,517,632	\$210,990,942	\$3,935,051,564

Total Contingency/Reserves is \$903 million or 29.3% of Total Program Costs excluding BART/Muni Pedestrian Connector

<sup>\*\*</sup> ROW number was last updated with the 2013 Phase 2 cost estimate

# Phase 2 Funding

Phase 2 Potential Funding (in \$ millions)	Total Funds	Net Proceeds after Debt Financing
Committed Transportation Authority Sales Tax (Prop K)	\$83	\$83
Committed San Mateo County Sales Tax	\$19	\$19
Committed MTC/BATA Bridge Tolls	\$7	\$7
Committed Regional Transportation Improvement Program	\$18	\$18
Transit Center District Plan-Mello Roos	\$275 - \$375	\$275-\$375
Tax Increment Residual (After TIFIA repayment)	\$665 - \$735	\$200 - \$340
FTA New Starts	\$650	\$650
New MTC/BATA Bridge Tolls	\$300	\$300
Future San Francisco Sales Tax	\$350	\$350
Future California High-Speed Rail Funds	\$557	\$557
Land Sales (Block 4)	\$45	\$45
Passenger Facility Charges or Maintenance Contribution	\$2,510 - \$8,025	\$865 - \$1,920
TOTAL POTENTIAL FUNDS	\$5,479 - \$11,164	\$3,369 - \$4,664

# TRANSPORTATION AUTHORITY RECOMMENDATION

This section is to be completed by Transportation Authority Staff.									
Last Updated:	3/3/2017	Res. No:		Res. Date:					
Project Name:	Downtown Ex								
Grant Recipient:	Transbay Joir	Transbay Joint Powers Authority							
	Action	Amount	Pha	ise					
	Prop K Allocation	\$ 4,549,675	Design Enginee	ering (PS&E)					
Funding									
Recommended:									
	Total:	\$ 4,549,675							
Total Pr	op K Funds:	\$ 4,549,675		Total Prop AA Funds:	\$ -				
Justification for recommendations a multi-sponsor recom	and notes for								
Fund Expir	Fund Expiration Date: 6/30/2018 Eligible expenses must be incurred prior to this date.								
Future Commitment:	Action	Amount	Fiscal Year	Phase					
. ata. o oomminement.									
	Trigger:								

# TRANSPORTATION AUTHORITY RECOMMENDATION

# This section is to be completed by Transportation Authority Staff.

Last Updated:	3/3/2017	Res. No:	Res. Date:
Project Name:	Downtown Ext	ension - Preliminar	y Engineering
Grant Recipient:	Transbay Join	t Powers Authority	
Deliverab	les:		
	monthly report	shall include a sur ncluding agency wo	cost and progress by task. The mmary of all contracts and ork, showing the budgeted versus
2.			
3.			
4.			
5.			

# **Special Conditions:**

- 1. The recommended allocation is contingent upon a Prop K Strategic Plan amendment to the Caltrain Downtown Extension (DTX) to a Rebuilt Transbay Terminal category. The amendment would advance \$2,840,777 programmed for the DTX in FY 2033/34. Further, the recommended action requires an exception to the Strategic Plan policy that sets aside all remaining funds not already programmed to Phase 1 for Phase 2 construction. See attached Strategic Plan amendment for details.
- 2. As a condition of this allocation, the TJPA will agree to the attached oversight protocol for Phases 1 and 2 of the Transbay Transit Center Program.
- 3. One of the scope components of the Planning Department's Railyard Alternatives and I-280 Boulevard Feasibility Study (RAB) involves reviewing construction methods and rail alignment configurations for the DTX, and seeking opportunities to fund and build the project more cost effectively. If the SFCTA Board acts to endorse an alternate alignment for the Downtown Rail Extension, the SFCTA reserves the right to pause the work funded by the current request in order to meet with TJPA, the Planning Department and the Mayor's Office to discuss any needed modifications to the scope of work, including potentially ceasing work on certain scope elements.
- 4. As a condition of this allocation, the Transportation Authority intends to engage independent experts to complement its existing staff and PMO resources to participate in charrettes, workshops, peer review, and deliverables review as part of the subject scope of work. The experts will also make available their resources to provide recommendations, concepts and ideas for the consideration of the TJPA.

# TRANSPORTATION AUTHORITY RECOMMENDATION

# This section is to be completed by Transportation Authority Staff. Last Updated: 3/3/2017 Res. No: Res. Date: Project Name: Downtown Extension - Preliminary Engineering **Grant Recipient:** Transbay Joint Powers Authority Notes: 1. 2. Metric Prop K Prop AA **Actual Leveraging - Current Request** 0.00% No Prop AA Actual Leveraging - This Project | See Above See Above **SFCTA Project** Reviewer: CP **SGA PROJECT NUMBER** Transbay Joint Powers Authority Sponsor: **SGA Project Number:** 105-914028 Name: Downtown Extension - Preliminary Engineering **Fund** Phase: Design Engineering (PS&E) Share: 100.00% Cash Flow Distribution Schedule by Fiscal Year

FY 2017/18

\$1,819,870

FY 2016/17

\$2,729,805

**Fund Source** 

Prop K

FY 2018/19

FY 2019/20

FY 2020/21+

**Total** 

\$4,549,675

FY of Allocation Action:	2016/17 Current Prop K Request:	\$ 6,774,400
	Current Prop AA Request	\$ -
Project Name:	Downtown Extension - Preliminary Engineering	
Grant Recipient:	Transbay Joint Powers Authority	

1) The requested sales tax and/or vehicle registration fee revenues will be used to supplement and under no circumstance replace existing local revenues used for transportation purposes.

Required for Allocation Request Form Submission
Initials of sponsor staff member verifying the above statement

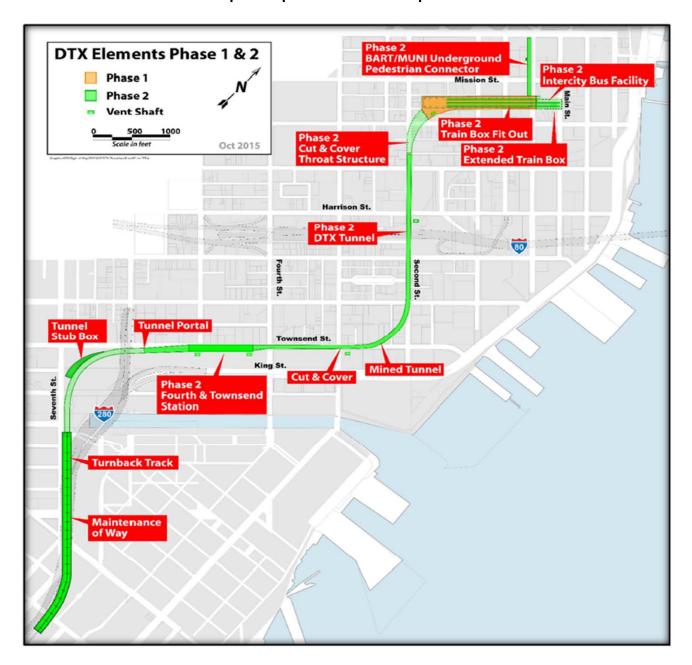
Sdd

CONTACT INFORMATION						
	Project Manager	Grants Section Contact				
Name:	Brian Dykes	Sara DeBord				
Title:	Principal Engineer	Chief Financial Officer				
Phone:	415.597.4617	415.597.4039				
Email:	bdykes@transbaycenter.org	sdebord@transbaycenter.org				

# **MAPS AND DRAWINGS**



Railyard Alternatives and I-280 Boulevard Feasibility Study





FY of Allocation Action: 2016/17 **Project Name:** Downtown Extension - Tunnel Engineering Options Study **Grant Recipient:** Transbay Joint Powers Authority **EXPENDITURE PLAN INFORMATION** Prop K EP category: Caltrain Downtown Extension to a Rebuilt Transbay Terminal: (EP-5) Prop K EP Line Number (Primary): 5 Current Prop K Request: \$ 915.000 Prop K Other EP Line Numbers: Prop AA Category: Current Prop AA Request: \$ Supervisorial District(s): District 06 **REQUEST** Brief Project Description (type below) Phase 2 of the Transbay Transit Center Program is a 1.3-mile Downtown Rail Extension (DTX) tunnel that extends Caltrain commuter rail from its current terminus at Fourth and King streets to the new Transbay Transit Center (TTC). It also completes the build-out of the below-grade train facilities at the TTC, a new underground station along the DTX alignment, an intercity bus facility, and provides the tracks and northern terminus for California's future High-Speed Rail system. The subject request is for an engineering study to

# Detailed Scope, Project Benefits and Community Outreach (type below)

analyze opportunities to reduce surface impacts due to construction of DTX.

Preliminary engineering (PE) (30% design level) for many components of Phase 2, was completed in July 2010. Subsequently, as a result of new requirements by the California High-Speed Rail Authority (CHSRA), as well as other factors, elements have been modified or added to Phase 2. These additions and modifications are included in a draft Supplemental Environmental Impact Statement/Environmental Impact Report (SEIS/EIR) released in December 2015 for public comment. Further design work on some of these new or modified elements is described in a separate request. The TJPA has also been requested by the Transportation Authority staff to study opportunities for reducing the surface impacts of the DTX construction. The subject request to fund a Tunnel Options Engineering Study would focus on three areas: Throat cut-and-cover (west side of the Transbay Transit Center where three tracks need to fan into six tracks); Townsend Cut-and-Cover; and the Third/Townsend ventilation structure site. The work is scheduled to be complete within 3 months of issuing a Notice to Proceed. See attached Word document for details.

# Project Location (type below) First & Mission Streets, San Francisco, CA Project Phase (select dropdown below) Design Engineering (PS&E) Map or Drawings Attached? Yes Other Items Attached? Yes

SYPPISTRATEGIC PLAIN INFOR	IVIA I IO	N		
Type of Project in the Prop K 5YPP/Prop AA Strategic Plan?	Named F	Project		
Is the requested amount greater than the amount programmed in the relevant 5YPP or Strategic Plan?	Greater t	han Program	med Amount	
Prop K SP/5YPP Amount:	\$	2,623,898	Prop AA Strategic Plan Amount:	

# Please describe and justify the necessary amendment:

The Strategic Plan establishes a policy requiring all remaining funds not currently programmed to Phase 1 to be spent on construction of Phase 2 (DTX) to reinforce the need to complete the DTX as soon as possible and to avoid using all of the Prop K funds on Phase 1. SFCTA staff supports the recommended request, which requires an exception to this policy, now that Phase 1 is fully funded and appears on track to be delivered within the revised budget. Further, the proposed scope will support TJPA's efforts to advance design and develop a solid cost estimate, both of which will facilitate TJPA's ability to secure funding for DTX.

#### **Background and Project Benefits**

The Transbay Transit Center Program (Program) is an approximately \$6 billion program to replace the former Transbay Terminal at First and Mission streets in downtown San Francisco with a modern regional transit hub that will connect eight Bay Area counties and the State of California through eleven transit systems including Caltrain commuter rail and the future California High-Speed Rail system from San Francisco to Los Angeles.

The Program is being constructed in two phases. Phase 1 includes design and construction of the above-grade portion of the Transit Center, the core and shell of the two below-grade levels of the train station, a new bus ramp, a bus storage facility, and a temporary bus terminal. Phase 2 will complete the build-out of the below-grade train station facilities at the Transit Center and build the Downtown Rail Extension (DTX) tunnel, a new underground station along the DTX alignment, and an intercity bus facility.

Phase 2 will provide the following public benefits:

- Improve access to rail services and enhance San Francisco's accessibility to a local and regional workforce
- Enhance connectivity between Caltrain and other major transit services
- Create the northern terminus for the state's future high-speed rail system
- Build a new intercity bus station next to the Transit Center for Greyhound, Amtrak and other regional bus service providers
- Contribute to improved regional air quality by attracting thousands of new transit riders and reducing the number of vehicles on Highways 101 and 280

#### **Current Request**

Preliminary engineering (PE) (30% design level) for many components of Phase 2, including the Fourth and Townsend Street Station, was completed in July 2010. Subsequently, as a result of new requirements by the California High-Speed Rail Authority (CHSRA), as well as other factors, elements have been modified or added to Phase 2. These additions and modifications are included in a draft Supplemental Environmental Impact Statement/Environmental Impact Report (SEIS/EIR) released in December 2015 for public comment. Further design work on these new or modified elements is outlined in a separate request; however, the TJPA has also been requested by the Transportation Authority staff to study opportunities for reducing the surface impacts of the DTX construction.

The current request would fund an engineering study and associated program management/program controls work to evaluate opportunities for reducing the surface impacts of the construction of Phase 2, as described in detail below.

#### **Tunneling Options Engineering Study**

Parsons Transportation Group

The Downtown Extension designer, Parsons Transportation Group, will analyze opportunities to reduce surface impacts due to DTX construction. This contract was renewed by the TJPA Board in 2014. This request is for \$790,130. Tasks will include the following:

- A. Tunneling Options Engineering Study
  - 1. Project meetings (e.g., TJPA staff or Board meetings)
  - 2. Scheduling
  - 3. Quality Control and Quality Assurance
  - 4. Other Direct Costs as requested and/or agreed by TJPA
  - 5. Analyze opportunities to reduce the surface impacts due to Phase 2 construction
    - a. Structural Throat Cut-and-Cover: Analyze options for reducing the cut-and-cover construction in the Throat area
    - b. Structural Townsend Street Cut-and-Cover: Review and analyze engineering solutions to reduce the cut-and-cover construction on Townsend Street
    - c. Ventilation/Emergency Exit Structures: Determine feasible engineering options for the Third/Townsend ventilation structure site
  - 6. Tunnel Options Engineering Study Report
    - a. Prepare a report with conceptual level cost estimates, and summarize technical calculations

#### **Exclusions:**

- 1. Final Design
- 2. Technical Specifications
- 3. Design-Build Contract Documents (in the event that Design-Build is the chosen delivery method)

#### **Program Management/Program Controls (PMPC)**

AECOM (URS)

The PMPC provides a variety of services and reports to augment TJPA staff in implementing the Transbay Transit Center Program. Specific tasks include program management services, program implementation and support, program controls management, quality assurance and control implementation, risk management program implementation, document control, administrative support, and project management for Phases 1 and 2 of the Program. The contract was awarded in 2013. This funding request is for **\$90,105** for the following tasks:

- A. Phase 2 Program Management
  - 1. Program Management
    - a. Project meetings
    - b. Project controls support, including an update to the Phase 2 Budget
    - c. Program coordination support
    - d. Utility coordination support

#### 2. DTX Project Management

- a. Contribute to monthly PMPC status reports
- b. Project meetings
- c. Work with estimators, technical specialists and Program Controls Manager to validate scope and develop the project budget and schedule for Phase 2, including subprojects and project components. Maintain current and accurate information regarding project scope, schedule and budget
- d. Maintain an issue-action tracking system to facilitate timely decision-making
- e. Manage the DTX design consultant including, but not limited to, invoice reviews, submittal reviews, contract negotiations, coordination with TTC design consultant, and correspondence on technical project issues
- f. Refine and validate design constraints, criteria, and standards with the engineering design team as requested by TJPA. Complete, maintain and update design criteria as necessary
- g. Provide technical, project-specific assistance to TJPA, including preparation of letters and presentations
- h. Coordinate with train operators and outside agencies
- i. Coordinate with adjacent properties along the alignment to determine potential impacts to DTX and/or the properties
- j. Manage interfaces between Phase 2 components and other component projects of the Program

#### 3. Document Management and Administrative Support

- a. Record keeping and submittal logging
- b. Document retrieval and issuance to support project or outside agency requests
- c. Technical and editorial reviews of project documents, letters, and presentations

Project Name: Downtown Extension - Tunnel Engineering Options Study

#### **ENVIRONMENTAL CLEARANCE**

**Environmental Type**: EIR/EIS

#### **PROJECT DELIVERY MILESTONES**

Enter dates below for ALL project phases, not just for the current request, based on the best information available. For PLANNING requests, please only enter the schedule information for the PLANNING phase.

Phase	St	art	End		
Filase	Quarter	Calendar Year	Quarter	Calendar Year	
Planning/Conceptual Engineering (PLAN)		1995		2001	
Environmental Studies (PA&ED)		2001	Oct-Dec	2016	
Right-of-Way	Jul-Sep	2004	Oct-Dec	2019	
Design Engineering (PS&E)	Jan-Mar	2005	Jul-Sep	2019	
Advertise Construction	Jul-Sep	2018			
Start Construction (e.g. Award Contract)	Oct-Dec	2018			
Operations (i.e., paratransit)					
Open for Use			Oct-Dec	2025	
Project Completion (means last eligible expenditure)			Oct-Dec	2025	

#### **SCHEDULE DETAILS**

Provide dates for any COMMUNITY OUTREACH planned during the requested phase(s). Identify PROJECT COORDINATION with other projects in the area (e.g. paving, MUNI Forward) and relevant milestone dates (e.g. design needs to be done by DATE to meet paving schedule). List any timely use-of-funds deadlines (e.g. federal obligation deadline). If a project is comprised of MULTIPLE SUB-PROJECTS, provide milestones for each sub-project. For PLANNING EFFORTS, provide start/end dates for each task.

The schedule presented above is based on the Phase 2 schedule presented to the TJPA Board of Directors in June 2016, at which the Board provided direction to complete Phase 2 preliminary engineering.

The subject scope is anticipated to be completed within three months of issuing the Notice to Proceed.

Project Name: Downtown Extension - Tunnel Engineering Options Study

#### **FUNDING PLAN - FOR CURRENT REQUEST**

Enter the funding plan for the phase(s) that are the subject of the CURRENT REQUEST. Totals should match those shown in the Cost Summary below.

Fund Source	Planned	Pro	ogrammed	A	Allocated	Total
Prop K	\$ 915,000			\$		\$ 915,000
Prop AA	\$ -	\$	-	\$	-	\$ -
	\$ -	\$	-	\$	-	\$ -
Total:	\$ 915,000	\$	-	\$	-	\$ 915,000

#### **FUNDING PLAN - FOR ENTIRE PROJECT (ALL PHASES)**

Enter the funding plan for all phases (planning through construction) of the project. This section may be left blank if the current request covers all project phases. Totals should match those shown in the Cost Summary below.

Fund Source	Plai	nned	Progr	ammed	Allo	cated		Total
Prop K	\$						\$	-
Prop AA	\$	See attached -						-
	\$	-	1 \$	277	\$	_	\$	-
Total:	\$	-	\$	-	\$	-	\$	-

#### **COST SUMMARY**

Show total cost for ALL project phases (in year of expenditure dollars) based on best available information. Source of cost estimate (e.g. 35% design, vendor quote) is intended to help gauge the quality of the cost estimate, which should improve in reliability the farther along a project is in its development.

Phase	Total Cost	C	Prop K - Current Request	Prop AA - Current Request	Source of Cost Estimate
Planning/Conceptual Engineering (PLAN)	\$ -				Completed by Caltrain
Environmental Studies (PA&ED)	\$ 34,184,166				Included in 2016 Phase 2 Cost Estimate (Programwide)
Right-of-Way	\$ 266,200,000	\$	-		2016 Phase 2 cost estimate
Design Engineering (PS&E)	\$ 130,297,416	\$	915,000	\$ -	TJPA Approved Budget for Phase 2
Construction (CON)	\$ 3,504,369,982	\$	-	\$ -	2016 Phase 2 cost estimate - see attached detailed estimate
Operations					
(Paratransit)	\$ -	\$	-		
Total:	\$ 3,935,051,564	\$	915,000	\$ -	

% Complete of Design: 58% as of 5/31/2016

Expected Useful Life: 70 Years

#### PROPOSED REIMBURSEMENT SCHEDULE FOR CURRENT REQUEST (instructions as noted below)

Use the table below to enter the proposed reimbursement schedule for the current request. Prop K and Prop AA policy assume these funds will not be reimbursed at a rate greater than their proportional share of the funding plan for the relevant phase unless justification is provided for a more aggressive reimbursement rate. If the current request is for multiple phases, please provide separate reimbursement schedules by phase. If the proposed schedule exceeds the years available, please attach a file with the requested information.

Fund Source	FY 20	016/17	FY 20	17/18	FY 2	2018/19	FY	2019/20	FY 2	2020/21+	Total
Prop K	\$	915,000			\$	-	\$	-	\$	-	\$ 915,000
Prop AA	\$	-	\$	-	\$	-	\$	-	\$	-	\$ -

### Phase 2 Funding

Phase 2 Potential Funding (in \$ millions)	Total Funds	Net Proceeds after Debt Financing
Committed Transportation Authority Sales Tax (Prop K)	\$83	\$83
Committed San Mateo County Sales Tax	\$19	\$19
Committed MTC/BATA Bridge Tolls	\$7	\$7
Committed Regional Transportation Improvement Program	\$18	\$18
Transit Center District Plan-Mello Roos	\$275 - \$375	\$275-\$375
Tax Increment Residual (After TIFIA repayment)	\$665 - \$735	\$200 - \$340
FTA New Starts	\$650	\$650
New MTC/BATA Bridge Tolls	\$300	\$300
Future San Francisco Sales Tax	\$350	\$350
Future California High-Speed Rail Funds	\$557	\$557
Land Sales (Block 4)	\$45	\$45
Passenger Facility Charges or Maintenance Contribution	\$2,510 - \$8,025	\$865 - \$1,920
TOTAL POTENTIAL FUNDS	\$5,479 - \$11,164	\$3,369 - \$4,664

# **General Instructions**

- Sponsor may attach budget details in sponsor agency format (Excel), which includes all required information (per phase) detailed below.
- Contingencies should be called out in each phase.

For Design Engineering Phase:

Project Name: DTX

PROJECT BUDGET - DESIGN

Agency/Consultant         Total         % of Total         Contingency           Parsons (Designer)         \$ 790,130         \$ 0,005         \$ 50,105         \$ 50,105         \$ 50,00						
cy/Consultant         Total         %           signer)         \$ 790,130           IPC)         \$ 90,105           nsultant         \$ -           Itant         \$ -           \$ 34,765           \$ 34,765	BUDGET SUMMARY					
signer)		To	tal	% of Total		
PC)	Parsons (Designer)	\$	790,130			
tant	AECOM (PMPC)	\$	90,105	%8'6		
tant	Financial Consultant	\$	•	%0:0		
\$ - \$ \$ 34,765 \$ 915,000	ROW Consultant	\$	-	%0.0		
\$ 34,765 \$ 915,000	TJPA Staff	\$	-	%0.0		
\$ 915,000	Contingency	\$	34,765	3.8%		
	Total	\$	915,000	100.0%		

2016 Phase 2 Cost Estimate (in year of expenditure dollars)

		Direct Costs	Design Contingency	Total Cost
DTX				S1 4/2 222 000
DIX	Samuel 10 Family and View Sanfar Station and Vand Ulanda	***		\$1,467,777,900
	Segment 10 Fourth and King Surface Station and Yard Upgrade	\$0		\$0
-	Segment 9 At Grade Trackway	\$707,000		\$707,000
_	Segment 8 U-Wall Segment	\$57,906,000		\$57,906,000
-	Segment 7 Cut and Cover West of Fifth St	\$92,220,000		\$92,220,000
	Segment 6 Cut and Cover Fourth & Townsend Underground Station	\$123,721,000		\$123,721,000
	Segment 5 Cut and Cover East of Fourth St	\$82,069,000		\$82,069,000
	Segment 4 NATM Mined Tunnel	\$387,981,000		\$387,981,000
	Segment 3 Cut and Cover Throat Structure	\$151,037,000		\$151,037,000
	Segment 2 Transit Center Trackworks	\$889,000		\$889,000
-		\$82,775,000		\$82,775,000
	Systems	\$92,662,000		\$92,662,000
	Allowances	\$90,162,000		\$90,162,000
	Design Contingency		\$199,551,900	\$199,551,900
	nce for Properties Demolition	\$3,000,000		\$3,000,000
Tunnel S	Stub Box	\$99,876,000	included	\$99,876,000
DTX V	ent Structures (heighting of structures)	\$3,222,000	included	\$3,222,000
Transit	Center Building (TCB)			\$247,203,907
	Transit Center Fit Out	\$150,255,780	\$7,512,576	\$157,768,356
	Allowance for RVA for above at 5%	\$7,512,789		\$7,512,789
	Train Box Extension	\$55,631,840	\$2,782,176	\$58,414,016
	Allowance for RVA for above at 5%	\$2,781,592	\$514,738	\$3,296,330
IBF - PC	CPA 95% CD Estimate item 2.3 plus 16.8% for escalation to 2016	\$12,582,864	\$629,552	\$13,212,416
	nce for IBF Escalator and Elevator from Beale street to Below rain Box	\$5,000,000		\$5,000,000
Allowar	nce for Main Street Utility Relocation	\$2,000,000		\$2,000,000
	Subtotal DTX and TCB Construction excluding escalation	\$1,503,991,865	\$210,990,942	\$1,714,981,807
DTX an	d TCB Construction Escalation at 5% to mid construction (2023)			\$583,257,836
	Subtotal DTX and TCB Construction including escalation			\$2,298,239,643
ROW**	•			\$266,200,000
Program	nwide @ 22.5% of above excluding ROW			\$517,103,920
	Subtotal Program Costs			\$3,081,543,562
Constru	ction Contingency @ 10%			\$229,823,964
	m Reserve @ 15% of Subtotal Program Costs			\$462,231,534
	Total Program Cost excluding BART/Muni Pedestrian Connector			\$3,773,599,061
BART/	Muni Pedestrian Connector - Direct Construction Cost	\$109,525,767	included	\$109,525,767
	Muni Pedestrian Connector - Escalation			\$37,249,236
	Muni Pedestrian Connector - Construction Contingency			\$14,677,500
	BART/Muni Pedestrian Connector Total Cost			\$161,452,503
	Total Program Cost including BART/Muni Pedestrian Connector	\$1,613,517,632	\$210,990,942	\$3,935,051,564

Total Contingency/Reserves is \$903 million or 29.3% of Total Program Costs excluding BART/Muni Pedestrian Connector

<sup>\*\*</sup> ROW number was last updated with the 2013 Phase 2 cost estimate

# TRANSPORTATION AUTHORITY RECOMMENDATION This section is to be completed by Transportation Authority Staff.

Last Updated:	3/3/2017		Res. No:		Res. Date:	
Project Name:	Downtown Ex	ten	sion - Tun	nel Engineerir	ng Options Study	
Grant Recipient:	Transbay Joi	nt P	owers Aut	hority		
	Action	A	Amount	Pha	ase	
	Prop K Allocation	\$	915,000	Design Engine	ering (PS&E)	
Funding						
Recommended:						
	Total:	\$	915,000			
Total Prop K Funds: \$ 915,000 Total Prop AA Funds						\$ -
Justification for multi-phase recommendations and notes for multi-sponsor recommendations:						
Fund Expir	6/	30/2018	Eligible expen	ses must be incurred ate.		
Future Commitment:	Action	A	Mount	Fiscal Year	Phase	
	Trigger:					

#### TRANSPORTATION AUTHORITY RECOMMENDATION

#### This section is to be completed by Transportation Authority Staff.

Last Updated:	3/3/2017	Res. No:	Res. Date:							
Project Name:	Downtown Ext	tension - Tunnel En	gineering Options Study							
Grant Recipient:	Transbay Join	t Powers Authority								
Deliverab	oles:									
1.	Provide monthly report detailing cost and progress by task. The									
	monthly report shall include a summary of all contracts and									
	agreements, ir	ncluding agency wo	rk, showing the budgeted versus							
	actual amount	S.								
2.	Draft and Fina	I Tunnel Options Er	gineering Study Report.							
3.										
4.										
5.										

#### **Special Conditions:**

- 1. The recommended action requires an exception to the Strategic Plan policy that sets aside all remaining funds not already programmed to Phase 1 for Phase 2 (DTX) construction. See attached Strategic Plan amendment for details.
- 2. As a condition of this allocation, the TJPA will agree to the attached oversight protocol for Phases 1 and 2 of the Transbay Transit Center program.
- 3. One of the scope components of the Planning Department's Railyard Alternatives and I-280 Boulevard Feasibility Study (RAB) involves reviewing construction methods and rail alignment configurations for the DTX, and seeking opportunities to fund and build the project more cost effectively. If the SFCTA Board acts to endorse an alternate alignment for the Downtown Rail Extension, the SFCTA reserves the right to pause the work funded by the current request in order to meet with TJPA, the Planning Department and the Mayor's Office to discuss any needed modifications to the scope of work, including potentially ceasing work on certain scope elements.
- 4. Following completion of the draft Tunnel Options Engineering Study Report (anticipated 3 months after the notice to proceed), TJPA staff will present the draft report findings to the Transportation Authority Board.
- 5. As a condition of this allocation, the Transportation Authority intends to engage independent experts to complement its existing staff and PMO resources to participate in charrettes, workshops, peer review, and deliverables review as part of the subject scope of work. The experts will also make available their resources to provide recommendations, concepts and ideas for the consideration of the TJPA.

#### TRANSPORTATION AUTHORITY RECOMMENDATION

#### This section is to be completed by Transportation Authority Staff. **Last Updated:** 3/3/2017 Res. No: Res. Date: Project Name: Downtown Extension - Tunnel Engineering Options Study **Grant Recipient:** Transbay Joint Powers Authority Notes: 1. 2. Metric Prop K Prop AA **Actual Leveraging - Current Request** 0.00% No Prop AA Actual Leveraging - This Project | See Above See Above

**SFCTA Project** 

Reviewer: CP

SCA	PRO.	IFCT	MILIM	IRFD
JUA	FRU.	JEGI		IDEK

Sponsor:	Transbay Joi	nt Powers Aut	hority				
SGA Project Number:	105-914029	Name:	Downtown Exte	ension - Tunnel	Engineering (	Options Study	
Phase:	Design Engine	Design Engineering (PS&E)					
	Cash Flow	<b>Distribution</b>	Schedule by	Fiscal Year	Share:	100.00%	
Fund Source	FY 2016/17	FY 2017/18	FY 2018/19	FY 2019/20	FY 2020/21+	Total	

Fund Source	FY 2016/17	FY 2017/18	FY 2018/19	FY 2019/20	FY 2020/21+	Total
Prop K	\$915,000					\$915,000

FY of Allocation Action:	2016/17	Current Prop K Request:	\$ 6,774,400
-		Current Prop AA Request:	\$ -
Project Name:	Downtown Ext	ension - Tunnel Engineering Options Study	
_			
Grant Recipient:	Transbay Join	t Powers Authority	

1) The requested sales tax and/or vehicle registration fee revenues will be used to supplement and under no circumstance replace existing local revenues used for transportation purposes.

Required for Allocation Request Form Submission
Initials of sponsor staff member verifying the above statement

Sdd

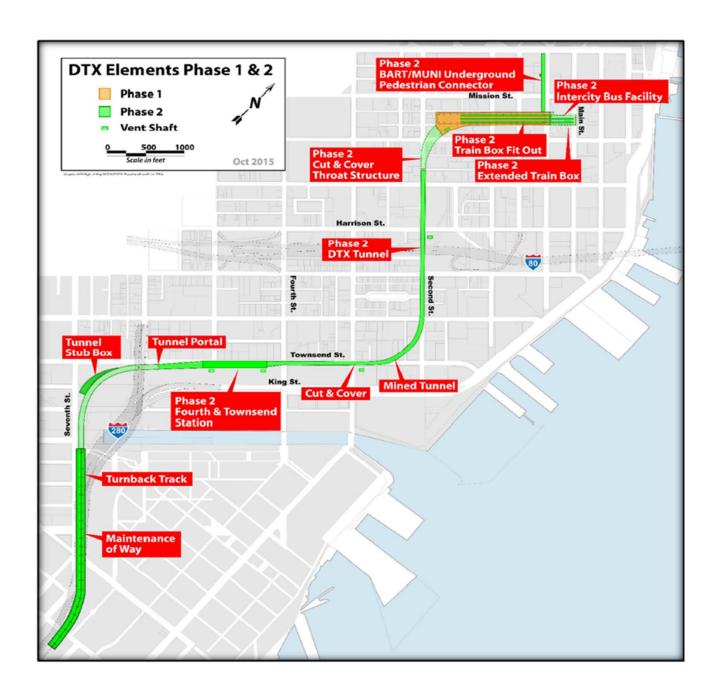
	CONTACT INFO	ORMATION
	Project Manager	Grants Section Contact
Name:	Brian Dykes	Sara DeBord
Title:	Principal Engineer	Chief Financial Officer
Phone:	415.597.4617	415.597.4039
Email:	bdykes@transbaycenter.org	sdebord@transbaycenter.org

#### **MAPS AND DRAWINGS**



Please see TJPA Board Report from June 9, 2016 at:

http://transbaycenter.org/uploads/2016/06/ltem13\_DTX-Phase-2.pd



FY of Allocation Action: 2016/17

Project Name: Downtown Extension - Additional Oversight/Peer Review

**Grant Recipient:** San Francisco County Transportation Authority

#### **EXPENDITURE PLAN INFORMATION**

Prop K EP category: Caltrain Downtown Extension to a Rebuilt Transbay Terminal: (EP-5)

Prop K EP Line Number (Primary): 5 Prop K Other EP Line Numbers:

Current Prop K Request: \$

200,000

Prop AA Category:

Current Prop AA Request: \$

Supervisorial District(s): District 06

#### **REQUEST**

#### **Brief Project Description (type below)**

Phase 2 of the Transbay Transit Center Program is a 1.3-mile Downtown Rail Extension (DTX) tunnel that extends Caltrain commuter rail from its current terminus at Fourth and King streets to the new Transbay Transit Center (TTC). It also completes the build-out of the below-grade train facilities at the TTC, a new underground station along the DTX alignment, an intercity bus facility, and provides the tracks and northern terminus for California's future High-Speed Rail system.

#### **Detailed Scope, Project Benefits and Community Outreach (type below)**

In response to the Board's interest in increased oversight for the Transbay Transit Center, the work to be performed under this appropriation is intended to complement and enhance the Authority's ongoing oversight functions. It is the intent of the SFCTA to engage independent experts in the areas of tunneling/underground construction, cost estimating, funding, and right-of-way to participate in charrettes, workshops, peer reviews, and deliverables review to assure that the studies and design to be performed by the TJPA meet the highest standards of quality as well as the project needs. The experts will also make available their resources to provide recommendations, concepts and ideas for the consideration of TJPA.

Of particular interest will be the tunneling options analysis. There has been concern related to the socioeconomic impacts of the proposed cut-and-cover construction methodology contemplated for Townsend Street under the project's EIS/EIR, approved in 2004. This effort will consider other construction methodologies with the goal of reducing the cut-and-cover activities on the project as much as possible. To meet this objective, TJPA will have to consider a variety of construction methodologies that may be applicable to the challenges of the project and avail themselves not only of the tried-and-true traditional methodologies, but also some of the newer techniques in underground construction developed since the EIR/EIS was approved. To this end, the tunneling /underground construction specialists to be engaged under this appropriation will participate in the charrette sessions to suggest alternatives for consideration and provide peer review of the subsequent alternative development.

Another area of focus will be the Funding Plan Update. With the federal funding uncertainties related to the current administration, alternative project delivery methods, including P3, should be revisited. Our funding specialists will work together with TJPA staff and consultants to assist in the development of realistic funding plans based on a variety of delivery methods.

Staff intends to issue Task Orders to prequalified firms from the On-Call Project Management Services/General Engineering approved consultant list recently approve by the Board. With the additional technical oversight provided under this appropriation SFCTA staff will better be able to advise the Board on decisions regarding support and funding for this critical project.

Project Location (type below)	
First & Mission Streets, San Francisco, CA	
Project Phase (select dropdown below)	
Design Engineering (PS&E)	
Map or Drawings Attached? Yes	
Other Items Attached? Ves	

SYPPISTRATEGIC PLAIN INFOR				
Type of Project in the Prop K 5YPP/Prop AA Strategic Plan?	Named Pr	oject		
Is the requested amount greater than the amount programmed in the relevant 5YPP or Strategic Plan?	Greater th	an Program	med Amount	
Prop K SP/5YPP Amount:	\$	2,623,898	Prop AA Strategic Plan Amount:	

#### Please describe and justify the necessary amendment:

The Strategic Plan establishes a policy requiring all remaining funds not currently programmed to Phase 1 to be spent on construction of Phase 2 (DTX) to reinforce the need to complete the DTX as soon as possible and to avoid using all of the Prop K funds on Phase 1. The subject request for funds to enhance oversight and peer review of the DTX requires an exception to this policy.

Project Name: Downtown Extension - Additional Oversight/Peer Review

#### **ENVIRONMENTAL CLEARANCE**

**Environmental Type**: EIR/EIS

#### **PROJECT DELIVERY MILESTONES**

Enter dates below for ALL project phases, not just for the current request, based on the best information available. For PLANNING requests, please only enter the schedule information for the PLANNING phase.

Phase	St	art	End			
Filase	Quarter	Calendar Year	Quarter	Calendar Year		
Planning/Conceptual Engineering (PLAN)		1995		2001		
Environmental Studies (PA&ED)		2001	Oct-Dec	2016		
Right-of-Way	Jul-Sep	2004	Oct-Dec	2019		
Design Engineering (PS&E)	Jan-Mar	2005	Jul-Sep	2019		
Advertise Construction	Jul-Sep	2018				
Start Construction (e.g. Award Contract)	Oct-Dec	2018				
Operations (i.e., paratransit)						
Open for Use			Oct-Dec	2025		
Project Completion (means last eligible expenditure)			Oct-Dec	2025		

#### **SCHEDULE DETAILS**

Provide dates for any COMMUNITY OUTREACH planned during the requested phase(s). Identify PROJECT COORDINATION with other projects in the area (e.g. paving, MUNI Forward) and relevant milestone dates (e.g. design needs to be done by DATE to meet paving schedule). List any timely use-of-funds deadlines (e.g. federal obligation deadline). If a project is comprised of MULTIPLE SUB-PROJECTS, provide milestones for each sub-project. For PLANNING EFFORTS, provide start/end dates for each task.

The schedule presented above is based on the Phase 2 schedule presented to the TJPA Board of Directors in June 2016, at which the Board provided direction to complete Phase 2 preliminary engineering. This request is intended to support enhanced oversight and peer review of the DTX scope of work under two concurrent TJPA allocation requests that advance preliminary engineering. That work is anticipated to be completed by December 2017.

Project Name: Downtown Extension - Additional Oversight/Peer Review

#### **FUNDING PLAN - FOR CURRENT REQUEST**

Enter the funding plan for the phase(s) that are the subject of the CURRENT REQUEST. Totals should match those shown in the Cost Summary below.

Fund Source	Planned	Pro	ogrammed	A	llocated	Total
Prop K	\$ 200,000			\$	-	\$ 200,000
Prop AA	\$ -	\$	-	\$	-	\$ -
	\$ -	\$	-	\$	-	\$ -
Total:	\$ 200,000	\$	-	\$	-	\$ 200,000

#### **FUNDING PLAN - FOR ENTIRE PROJECT (ALL PHASES)**

Enter the funding plan for all phases (planning through construction) of the project. This section may be left blank if the current request covers all project phases. Totals should match those shown in the Cost Summary below.

Fund Source	Plai	nned	Progr	ammed	Allo	cated	Total
Prop K	\$						\$ -
Prop AA	\$	Se	e attach	ed		-	\$ -
	\$	-	1 \$	277	\$	_	\$ -
Total:	\$	-	\$	-	\$	-	\$ -

#### **COST SUMMARY**

Show total cost for ALL project phases (in year of expenditure dollars) based on best available information. Source of cost estimate (e.g. 35% design, vendor quote) is intended to help gauge the quality of the cost estimate, which should improve in reliability the farther along a project is in its development.

Phase		Total Cost	Prop K - Current Request		Prop AA - Current Request	Source of Cost Estimate
Planning/Conceptual Engineering (PLAN)	\$	1	\$	-		Completed by Caltrain
Environmental Studies (PA&ED)	\$	34,184,166	\$	-		Included in 2016 Phase 2 Cost Estimate (Programwide)
Right-of-Way	\$	266,200,000	\$	-		2016 Phase 2 cost estimate
Design Engineering (PS&E)	\$	130,297,416	\$	200,000	\$ -	
Construction (CON) \$ 3,		3,504,369,982	\$	-	\$ -	2016 Phase 2 cost estimate - see attached detailed estimate
Operations						
(Paratransit)	\$	-	\$	-		
Total:	\$	3,935,051,564	\$	200,000	\$ -	

% Complete of Design: 58% as of 5/31/2016
Expected Useful Life: 70 Years

#### PROPOSED REIMBURSEMENT SCHEDULE FOR CURRENT REQUEST (instructions as noted below)

Use the table below to enter the proposed reimbursement schedule for the current request. Prop K and Prop AA policy assume these funds will not be reimbursed at a rate greater than their proportional share of the funding plan for the relevant phase unless justification is provided for a more aggressive reimbursement rate. If the current request is for multiple phases, please provide separate reimbursement schedules by phase. If the proposed schedule exceeds the years available, please attach a file with the requested information.

Fund Source	F	Y 2016/17	FY	2017/18	FY	2018/19	FY	2019/20	FY	2020/21+	Total
Prop K	\$	100,000	\$	100,000	\$	-	\$	-	\$	-	\$ 200,000
Prop AA	\$	-	\$	-	\$	-	\$	-	\$	-	\$ -

For Design Engineering Phase:

Project Name: Downtown Extension - Additional Oversight/Peer Review

PROJECT BUDGET - DTX PE Technical Studies Enhanced Oversight Cost Estimate

	Cost		12,506	24,244	25,009	61,758		16,774	28,258	45,031		12,000	22,000	34,000		5,768	7,542	7,842	21,152	161,942	32,388	194,330	200,000
			\$	\$	\$	<del>S</del>		s	\$	\$		s	s	s		↔	\$	\$	\$	\$	\$	\$	\$
	No. Hours		40	08	08			09	120			40	80			24	40	09					ED
	Unit Cost		313	\$ 303	\$ 313			280	335			300	\$ 275			240	189	131	•				ROUNDED
BUDGET SUMMARY	Category	1) Tunneling Concept Review	Project Manager   \$	Principal Tunnel Engineer	Principal Geo-Structural Engineer	Tunneling Concept Review SUB-TOTAL	2) Cost Estimate Update Review	Project Manager   \$	Cost Estimator   \$	Cost Estimate SUB-TOTAL	3) Funding Plan Development	Project Manager   \$	Value-for-Money Lead   §	Funding Plan SUB-TOTAL	4) ROW Acquisition Cost Estimate Update Review	Principal Consultant   \$	Managing Consultant   \$	Appraisal   \$	ROW Acquisition SUB-TOTAL	Oversight Cost SUB-TOTAL	20% Contingency	Oversight Cost TOTAL	

2016 Phase 2 Cost Estimate (in year of expenditure dollars)

		Direct Costs	Design Contingency	Total Cost
DTX				S1 4/2 222 000
DIX	Samuel 10 Family and View Santas Station and Vand Ulanda	***		\$1,467,777,900
	Segment 10 Fourth and King Surface Station and Yard Upgrade	\$0		\$0
-	Segment 9 At Grade Trackway	\$707,000		\$707,000
_	Segment 8 U-Wall Segment	\$57,906,000		\$57,906,000
-	Segment 7 Cut and Cover West of Fifth St	\$92,220,000		\$92,220,000
	Segment 6 Cut and Cover Fourth & Townsend Underground Station	\$123,721,000		\$123,721,000
	Segment 5 Cut and Cover East of Fourth St	\$82,069,000		\$82,069,000
	Segment 4 NATM Mined Tunnel	\$387,981,000		\$387,981,000
	Segment 3 Cut and Cover Throat Structure	\$151,037,000		\$151,037,000
	Segment 2 Transit Center Trackworks	\$889,000		\$889,000
-		\$82,775,000		\$82,775,000
	Systems	\$92,662,000		\$92,662,000
	Allowances	\$90,162,000		\$90,162,000
	Design Contingency		\$199,551,900	\$199,551,900
	nce for Properties Demolition	\$3,000,000		\$3,000,000
Tunnel S	Stub Box	\$99,876,000	included	\$99,876,000
DTX V	ent Structures (heighting of structures)	\$3,222,000	included	\$3,222,000
Transit	Center Building (TCB)			\$247,203,907
	Transit Center Fit Out	\$150,255,780	\$7,512,576	\$157,768,356
	Allowance for RVA for above at 5%	\$7,512,789		\$7,512,789
	Train Box Extension	\$55,631,840	\$2,782,176	\$58,414,016
	Allowance for RVA for above at 5%	\$2,781,592	\$514,738	\$3,296,330
IBF - PC	CPA 95% CD Estimate item 2.3 plus 16.8% for escalation to 2016	\$12,582,864	\$629,552	\$13,212,416
	nce for IBF Escalator and Elevator from Beale street to Below rain Box	\$5,000,000		\$5,000,000
Allowar	nce for Main Street Utility Relocation	\$2,000,000		\$2,000,000
	Subtotal DTX and TCB Construction excluding escalation	\$1,503,991,865	\$210,990,942	\$1,714,981,807
DTX an	d TCB Construction Escalation at 5% to mid construction (2023)			\$583,257,836
	Subtotal DTX and TCB Construction including escalation			\$2,298,239,643
ROW**	•			\$266,200,000
Program	nwide @ 22.5% of above excluding ROW			\$517,103,920
	Subtotal Program Costs			\$3,081,543,562
Constru	ction Contingency @ 10%			\$229,823,964
	m Reserve @ 15% of Subtotal Program Costs			\$462,231,534
	Total Program Cost excluding BART/Muni Pedestrian Connector			\$3,773,599,061
BART/	Muni Pedestrian Connector - Direct Construction Cost	\$109,525,767	included	\$109,525,767
	Muni Pedestrian Connector - Escalation			\$37,249,236
	Muni Pedestrian Connector - Construction Contingency			\$14,677,500
	BART/Muni Pedestrian Connector Total Cost			\$161,452,503
	Total Program Cost including BART/Muni Pedestrian Connector	\$1,613,517,632	\$210,990,942	\$3,935,051,564

Total Contingency/Reserves is \$903 million or 29.3% of Total Program Costs excluding BART/Muni Pedestrian Connector

<sup>\*\*</sup> ROW number was last updated with the 2013 Phase 2 cost estimate

### Phase 2 Funding

Phase 2 Potential Funding (in \$ millions)	Total Funds	Net Proceeds after Debt Financing
Committed Transportation Authority Sales Tax (Prop K)	\$83	\$83
Committed San Mateo County Sales Tax	\$19	\$19
Committed MTC/BATA Bridge Tolls	\$7	\$7
Committed Regional Transportation Improvement Program	\$18	\$18
Transit Center District Plan-Mello Roos	\$275 - \$375	\$275-\$375
Tax Increment Residual (After TIFIA repayment)	\$665 - \$735	\$200 - \$340
FTA New Starts	\$650	\$650
New MTC/BATA Bridge Tolls	\$300	\$300
Future San Francisco Sales Tax	\$350	\$350
Future California High-Speed Rail Funds	\$557	\$557
Land Sales (Block 4)	\$45	\$45
Passenger Facility Charges or Maintenance Contribution	\$2,510 - \$8,025	\$865 - \$1,920
TOTAL POTENTIAL FUNDS	\$5,479 - \$11,164	\$3,369 - \$4,664

#### TRANSPORTATION AUTHORITY RECOMMENDATION

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Last Updated:	3/15/2017		Res. No:		Res. Date:
Project Name:	Downtown Extension - Additional Oversight/Peer Review				
Grant Recipient:	San Francisco County Transportation Authority				
	Action		mount	Pha	ase
Funding	Prop K Appropriation	\$	200,000	Design Engine	ering (PS&E)
Recommended:					
	Total:	\$	200,000		
Total Pr	op K Funds:	\$	200,000		Total Prop AA Funds:
Justification for multi-phase recommendations and notes for multi-sponsor recommendations:  Fund Expiration Date: 6/30/2018 Eligible expenses must be incurred prior to this date.					
<b>5</b> 4 <b>6 1</b> 4	Action	A	mount	Fiscal Year	Phase
Future Commitment:					
	Trigger:				
Deliverat	oles:				
Provide monthly report detailing cost and progress for each task order to be issued to the SFCTA's on-call PMO/general engineering services consultants to support the scope of work.					
		ervi	ces consi	ultants to supp	ort the scope of work.
	engineering s TBD - memos	s an	d docume	ntation as requ	ort the scope of work. uested to support commendations to the
3.	engineering s TBD - memos reporting out	s an	d docume	ntation as requ	uested to support
	engineering s TBD - memos reporting out	s an	d docume	ntation as requ	uested to support
3. 4.	engineering s TBD - memos reporting out	s an	d docume	ntation as requ	uested to support
3. 4. 5. Special C	engineering s TBD - memos reporting out Board.  conditions:	s an of o	d docume versight a	ntation as requestivites and re	uested to support commendations to the
3. 4. 5. Special C 1.	engineering s TBD - memos reporting out Board.  Conditions: The recommed Plan policy the recommendation of the	of o	d docume versight a ed action rets aside	entation as requires and receivites and receivites and receivites an excellent and remaining for the second	uested to support
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#### TRANSPORTATION AUTHORITY RECOMMENDATION

# This section is to be completed by Transportation Authority Staff. Last Updated: 3/15/2017 Res. No: Res. Date: Project Name: Downtown Extension - Additional Oversight/Peer Review Grant Recipient: San Francisco County Transportation Authority Notes: 1. 2.

Metric	Prop K	Prop AA
Actual Leveraging - Current Request	0.00%	No Prop AA
Actual Leveraging - This Project	See Above	See Above

**SFCTA Project** 

Reviewer: CP

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Sponsor:	Transbay Joint Powers Authority					
SGA Project Number:	105-901xxx Name: Downtown Extension - Additional Oversight/Peer Review					Peer Review
Phase:	Design Engineering (PS&E)				Fund Share:	100.00%
Cash Flow Distribution Schedule by Fiscal Year						
Fund Source	FY 2016/17	FY 2017/18	FY 2018/19	FY 2019/20	FY 2020/21+	Total
Prop K	\$100,000	\$100,000				\$200,000

FY of Allocation Action:	2016/17	Current Prop K Request:	\$ 200,000
·		Current Prop AA Request:	\$ -
Project Name:	Downtown Ex	tension - Additional Oversight/Peer Review	
Grant Recipient:	San Francisco	o County Transportation Authority	

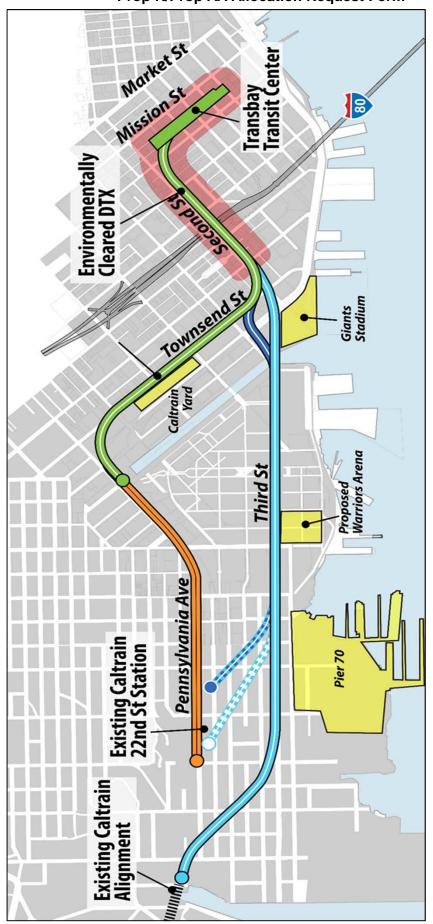
1) The requested sales tax and/or vehicle registration fee revenues will be used to supplement and under no circumstance replace existing local revenues used for transportation purposes.

Required for Allocation Request Form Submission
Initials of sponsor staff member verifying the above statement

# Project Manager Grants Section Contact Name: Eric Cordoba Steve Rehn Title: Deputy Director for Capital Projects Senior Transportation Planner Phone: Email: Eric.Cordoba@sfcta.org Steve.Rehn@sfcta.org



**Tunneling Study Scope** 



Railyard Alternatives and I-280 Boulevard Feasibility Study



## Memorandum

Date: 04.05.17 RE: Board April 11, 2017

To: Transportation Authority Board: Commissioners Peskin (Chair), Tang (Vice Chair), Breed,

Cohen, Farrell, Fewer, Kim, Ronen, Safai, Sheehy and Yee

From: Eric Cordoba – Deputy Director for Capital Projects

Anna LaForte - Deputy Director for Policy and Programming

Through: Tilly Chang – Executive Director

Subject: ACTION – Allocate \$5,464,675 in Prop K Funds, with Conditions, for the Downtown Extension

> Including \$4,549,675 for Preliminary Engineering and \$915,000 for a Tunneling Options Engineering Study, and Appropriate \$200,000 for Oversight of the Downtown Extension,

Subject to the Attached Fiscal Year Cash Flow Distribution Schedules

#### Summary

In response to feedback provided by the Board, the Transbay Joint Powers Authority (TJPA) has revised its prior \$6,774,400 request for Prop K funds for preliminary engineering of the Caltrain Downtown Extension (DTX) to a reduced scope and cost of \$4.5 million. The revised scope advances design of project segments that are common to all alignments being evaluated in the Planning Department's Railyard Alternatives and I-280 Boulevard Feasibility Study (RAB). As requested by Transportation Authority staff, the TJPA has also submitted a new request for \$915,000 for a Tunneling Options Engineering Study intended to analyze opportunities to reduce surface impacts due to construction of the DTX. With the evolution of construction technologies and methodologies since the project was environmentally cleared in 2004, there are opportunities worth exploring. TJPA expects to complete the tunneling study in about three months following issuance of a Notice to Proceed and will report back to the Board when the study is completed. We are proposing similar special conditions as were previously presented to the Board, including allowing the Transportation Authority to call for the work to be paused and renegotiated or cancelled if the Board endorses a different alignment and requiring continued compliance with the oversight protocol attached to the enclosed allocation request forms. In addition, we are requesting appropriation of \$200,000 in Prop K funds to enable us to tap into our on-call oversight and engineering services contract approved by the Board last month, to bring on independent experts in tunneling, cost estimation, right of way acquisition, and funding to assist with oversight and peer review of the DTX project during this critical preliminary engineering stage. There have been no changes to the requests since they were presented to the Board as an information item at its March 21 meeting.

#### BACKGROUND

This item was previously considered by the Board at its January 24, 2017 meeting and continued in order to allow more time to brief Commissioners and to be able to consider the item after receiving a presentation by the San Francisco Planning Department on its Railyard Alternatives and I-280 Boulevard Feasibility Study (RAB). Subsequently, Chair Peskin also requested that the Peninsula Joint Powers Board provide an update on the status of the Full Funding Grant Agreement for the Peninsula Corridor Electrification Project at the same meeting as the Downtown Extension (DTX) and RAB item. All three items were presented for information at the March 21 Board meeting.

The Prop K transportation sales tax funds being requested by the Transbay Joint Powers Authority (TJPA) and Transportation Authority staff come from the following Prop K Expenditure Plan line item:

Downtown Extension to Rebuilt Transbay Terminal

The aforementioned category is a named project in the Prop K Expenditure Plan with its own line item and does not require a 5-Year Prioritization Program as a prerequisite for allocation of funds. TJPA is the lead for implementing the Transbay Transit Center (TTC) Program. Phase 1 includes design and construction of the above-grade portion of the TTC, the core and shell of the two below-grade levels of the train station, a new bus ramp, a bus storage facility, and a temporary bus terminal. Phase 2 includes a 1.3-mile tunnel connecting the new TTC with the current Caltrain terminus at Fourth and King Streets, completes the build-out of the below-grade train station facilities at the TTC, and builds a new underground station along the DTW alignment and an intercity bus facility.

#### DISCUSSION

In response to feedback provided by the Board, the Transbay Joint Powers Authority (TJPA) has revised its prior \$6,774,400 request for Prop K funds for the preliminary engineering of the Caltrain Downtown Extension project to a reduced scope and cost of \$4.5 million. The revised scope advances design of project segments that are common to all alignments being evaluated in the Planning Department's RAB study. As requested by Transportation Authority staff, the TJPA has also submitted a new request for \$915,000 for a Tunneling Options Engineering Study intended to analyze opportunities to reduce surface impacts due to construction of the DTX. With the evolution of construction technologies and methodologies since the project was environmentally cleared in 2004, there are opportunities worth exploring. The results of this study will also be used to inform the alternatives being studied under RAB and support more "apples to apples" evaluation of the DTX alignment with those being evaluated by RAB. TJPA expects to complete that study in about three months of issuing a Notice to Proceed and will report back to the Board when the study is completed.

We are also requesting appropriation of \$200,000 in Prop K funds to enable us to tap into our on-call project management oversight and general engineering services contract approved by the Board last month, to bring on independent experts in tunneling, cost estimation, right-of-way, and funding/financing to assist with oversight and peer review of the DTX project during this critical preliminary engineering stage.

Attachment 1 summarizes the requests, including information on proposed leveraging (i.e. stretching Prop K dollars further by matching them with other fund sources) compared with the leveraging assumptions in the Prop K Expenditure Plan. Attachment 2 provides a brief description of the project. A detailed scope, schedule, budget and funding plan for the projects are included in the Allocation Request Forms (Attachment 5).

Proposed Special Conditions: Attachment 3 summarizes the proposed staff recommendations for the requests, highlighting special conditions included in the staff recommendation. We are proposing similar special conditions for the DTX allocations to TJPA as were previously presented to the Board, including allowing the Transportation Authority to call for the work to be paused and renegotiated or cancelled if the Board endorses a different alignment and requiring continued compliance with the oversight protocol attached to the enclosed allocation request forms. The oversight protocol applies to both the TTC and the DTX. It is modeled after the oversight protocol used for the Central Subway and the Caltrain Electrification project. TJPA has agreed to the oversight protocol, and it is already being implemented.

Transportation Authority and TJPA staff will attend the Board meeting to respond to any questions that the Board members may have.

#### **ALTERNATIVES**

- 1. Allocate \$5,464,675 in Prop K funds, with conditions, for the Downtown Extension including \$4,549,675 for Preliminary Engineering and \$915,000 for a Tunneling Options Engineering Study, and appropriate \$200,000 for oversight of the Downtown Extension, subject to the attached fiscal year cash flow distribution schedules, as requested.
- 2. Allocate \$5,464,675 in Prop K funds, with conditions, for the Downtown Extension including \$4,549,675 for Preliminary Engineering and \$915,000 for a Tunneling Options Engineering Study, and appropriate \$200,000 for oversight of the Downtown Extension, subject to the attached fiscal year cash flow distribution schedules, with modifications.
- 3. Defer action, pending additional information or further staff analysis.

#### CAC POSITION

The CAC was briefed on TJPA's original request for \$6,774,400 for preliminary engineering for the DTX at its September 7, 2016 special meeting and unanimously adopted a motion of support for the staff recommendation. The CAC was briefed on the subject three requests at its March 22 meeting. While it was an information item, CAC members expressed support for the allocations and appropriation. The CAC was also updated on the Caltrain Peninsula Corridor Electrification Program Full Funding Grant Agreement at its March meeting and will hear an update on the RAB Study at an upcoming meeting.

#### FINANCIAL IMPACTS

The Downtown Extension – Preliminary Engineering request requires a Strategic Plan amendment to advance \$3,040,777 from Fiscal Year (FY) 2033/34 to FY 2016/17, as described in Attachment 3. The amendment would increase financing costs in the Downtown Extension to a Rebuilt Transbay Terminal category by 0.5% from 8.65% to 9.15% over the 30-year life of the Prop K Expenditure Plan. These requested changes result in a minor increase of \$1,545,438 in finance costs to the Prop K program as a whole, which is a 0.06% increase in the amount of Prop K funds spent on financing over the life of the program (see Attachment 5 for details).

This action would allocate \$5,464,675 in FY 2016/17 Prop K sales tax funds and appropriate \$200,000 in Prop K funds. The allocations and appropriation would be subject to the Fiscal Year Cash Flow Distribution Schedules contained in the attached Allocation Request Forms.

Attachment 4, Prop K Allocation Summary - FY 2016/17, shows the total approved FY 2016/17 allocations and appropriations to date, with associated annual cash flow commitments as well as the recommended allocations and cash flows that are the subject of this memorandum.

Sufficient funds are included in the adopted FY 2016/17 budget to accommodate the recommended actions. Furthermore, sufficient funds will be included in future budgets to cover the recommended cash flow distribution for those respective fiscal years.

#### RECOMMENDATION

Allocate \$5,464,675 in Prop K funds, with conditions, for the Downtown Extension including \$4,549,675 for Preliminary Engineering and \$915,000 for a Tunneling Options Engineering Study, and appropriate

\$200,000 for oversight of the Downtown Extension, subject to the attached fiscal year cash flow distribution schedules.

#### Attachments (6):

- 1. Summary of Applications Received
- 2. Project Descriptions
- 3. Staff Recommendations
- 4. Prop K Allocation Summary FY 2016/17
- 5. Proposed Amended Strategic Plan
- 6. Prop K Allocation Request Forms (3)