2020 Financial Plan & Proposed Budget

SOUNDTRANSIT

October 2019

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SOUNDTRANSIT

October 2019

To: Sound Transit Board of Directors
From: Peter M. Rogoff, Chief Executive Officer
Subject: 2020 Proposed Budget

In 2019 Sound Transit continues to transform transit in the Central Puget Sound region. The year 2020 begins an intensive five-year period during which Sound Transit will open 28 new light rail stations and 24 bus rapid transit stations. Much of the work in 2019 has focused on positioning the agency for this intensive period and beyond.

2020 Budget Summary

The 2020 budget projects revenue and other funding sources of $2.5 billion and expenditures of $3.1 billion, with the difference coming from unrestricted cash balances. This compares to the 2019 budget, which included $2.4 billion in revenue and $2.9 billion in expenditures, again with the balance coming from unrestricted cash balances.

The budget-to-budget increase in revenue and other funding sources comprises a reduction in anticipated borrowing from $100 million in 2019 to zero in 2020, which is more than offset by increases in tax revenue and passenger fares.

On the expenditure side, the budget for capital and other projects totals $2.5 billion, primarily for preliminary engineering, right-of-way acquisition, and construction for system expansion projects. The 2020 budget also funds numerous projects to enhance and maintain existing facilities and equipment in a state of good repair.

The 2020 transit operating budget is $370 million as compared to the 2019 budget of $354 million. The budget reflects cost increases in insurance, public safety, security, maintenance and state of good repair, as well as the rising cost of operating contracts with our partner transit agencies. Sound Transit will hire new employees in preparation for opening the Northgate, Hilltop Tacoma and East Link extensions, and the arrival and testing of new light rail vehicles. The agency has budgeted 65 new positions for 2020, primarily due to these startup efforts for future Link services, along with growth in the capital program.

Finally, the budget includes $177 million for debt service, contributions to partner agencies, contingency, tax collection fees, and the sales and use tax offset fee.

2020 Look Ahead

Sound Transit is entering its most intensive five-year period of system expansion in 2020.

Construction on Link extensions to Northgate, Lynnwood, Bellevue, Redmond, and Hilltop Tacoma will be underway and construction on the Federal Way Link Extension will begin in 2020. The Operations and Maintenance Facility East (OMFE) in Bellevue's Spring District is under construction and will be substantially complete by the end of 2020. Between 2021 and 2024, all of these Link extensions plus the OMFE will open and commence passenger service.

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Sepcifically in 2020, the Northgate Link guideway and terminus station at Northgate will be substantially complete. Work will continue on post-substantial completion for underground stations at Roosevelt and U-District along with ongoing systems installation and startup activities.

On Lynnwood Link, civil construction will ramp up along the entire alignment, systems design will be completed, and property acquisitions and utility relocations will continue. From January to March 2020, East Link tracks will be connected to the existing Link system at the International District/Chinatown Station. This construction will reduce Link service but all stations will remain open. Most segments of East Link will also be substantially complete in 2020, clearing the way for systems installation and testing in advance of its 2023 opening.

The Downtown Redmond extension breaks ground in late 2019, while 2020 activities will include design, early construction, and advanced utility relocations late in the year.

Construction and startup activities will continue on the Hilltop Tacoma Link Extension, including training new employees to operate and maintain the system in advance of the extension opening in 2022.

The Federal Way Link extension will break ground in 2020, and design work, utility relocations, property acquisitions and seller relocations will continue in support of that project.

The Everett Link Extension and the Operations and Maintenance Facility North projects will begin alternatives identification and development in 2020. The OMF North will store and commission vehicles in advance of the Everett Link Extension service start up.

The West Seattle and Ballard Link extensions will continue with environmental review, preliminary engineering and risk and value engineering.

The Tacoma Dome Link Extension will include preliminary engineering and potential protective acquisitions.

The North Corridor Maintenance of Way Building includes project planning and early property acquisition.

The Board will proceed with clarifying options for the delivery date of Northeast 130th Street Infill Station.

Sounder continues expansion projects

In 2020, planning and community engagement for future Sounder investments will continue. Throughout 2019, Sound Transit has undertaken a public engagement process to gather input from communities and stakeholders to help determine the right mix of projects for expanding Sounder service, along with parking and access improvements. Early in 2020, the draft expansion plan will be released for public review, followed by planning for the first round of projects. The planning process will include further public outreach.

Regarding projects underway, the project baseline for the Sounder Maintenance Base will be prepared in early 2020. Other activities include relocating utilities and acquiring right-of-way.

Puyallup Station project work will include design and initial construction by the design-build contractor, as well as non-motorized improvements and stormwater work to be executed by the City of Puyallup.

Sumner Station project activities will include work by the City of Sumner on the Traffic Avenue/SR 410 Overpass. Sound Transit expects the Board to approve the project baseline in 2020.

Kent and Auburn Station Parking and Access Improvements activities include risk and value engineering and property acquisitions.

South Tacoma Station Access Improvements will begin with alternatives analysis.

The Edmonds and Mukilteo Stations Parking and Access Improvements project will complete an initial feasibility study.

Stride and ST Express Bus projects ramping up

I-405 BRT activities include completing environmental studies and continuing preliminary engineering and project development by WSDOT at NE 85th and Brickyard, and beginning WSDOT construction and property acquisition at N 44th in Renton.

SR522/NE 145th BRT activities include completing environmental work, continuing preliminary engineering, business access and transit lanes construction by the City of Bothell, and property acquisition.

Bus Base North activities include completing environmental work, a quantitative risk assessment, and developing the project baseline for Board adoption.

Sound Transit will contribute financially to support BRT initiatives led by the city of Seattle (Madison BRT), King County Metro (Rapid Ride C & D), and Pierce Transit (Pacific Avenue/SR7 BRT).

The Bus on Shoulder project continues with a feasibility study to identify potential projects and advance design, estimate costs and conduct environmental review on current candidate projects.

Conceptual engineering and environmental review will begin on the North Sammamish Park & Ride project.

Ensuring equitable development at our stations

The Transit Oriented Development program evaluates and plans for integrating capital projects with housing development. The program also includes station-area planning support and implementing a revolving loan fund.

Expansion of Sound Transit facilities includes more public art

The ST*art* program will work with artists to fabricate and install public art at stations and along the routes. In 2020 the ST*art* Program will focus on the Northgate, Hilltop, and East Link extensions, opening in 2021, 2022 and 2023 respectively.

Implementing new processes to ensure long-term affordability

We have implemented new cost controls to ensure sufficient financial capacity to deliver and operate our regional transit system. In particular, new budget procedures have increased scrutiny of operational spending and staffing. Managing cost effectiveness is an area of continuous improvement for the agency, with more changes planned for 2020.

Station improvements

We have continued to face challenges with escalator and elevator performance. In 2020, we will begin replacing 11 escalators at the University of Washington station and convert another pair of escalators to stairs, along with other customer access improvements. We will also improve wayfinding signage at existing Link and Sounder stations.

2019 Accomplishments

- In February we began the process to develop route and station location alternatives for the West Seattle and Ballard Link Extensions. After receiving input and feedback from community members, the Board identified preferred and other alternatives to study in a draft environmental impact statement. The project is now in environmental review.
- After a decade of mixed bus and rail operations in Downtown Seattle Transit Tunnel, in March, all bus routes moved to surface streets and the four downtown stations became Link-only. In January 2020 we are assuming sole responsibility for operating, securing, and maintaining these 30-year-old stations. Sound Transit has launched a comprehensive program to upgrade the stations to accommodate additional demand from expanding service to Northgate in 2021 and the Eastside in 2023.
- We deployed additional ST Express buses in March and September to maintain service levels in an environment of worsening regional traffic congestion.
- Also in March we debuted the popular double-decker buses on I-405 ST Express routes 532 and 535, increasing the capacity of each bus by 40 percent over the previous articulated buses.

- We passed an exciting East Link milestone in April, achieving 50 percent project completion. The project is on schedule to open in 2023.
- In May the Board approved a contract to add up to 900 electronic, on-demand bike lockers at stations throughout our service area, 134 of which will be installed prior to the end of the 2019. Sound Transit will install more on-demand lockers annually, eventually replacing all 451 traditional bike lockers.
- In June crews laid the first 300-foot sections of new rail for the 2.4-mile Hilltop Tacoma Link Extension, which will serve the Stadium and Hilltop districts with six new stations when it opens in 2022.
- Real-time arrival information is now digitally displayed at every Link Red Line station. Previously, this information was only available at the Capitol Hill and University of Washington stations.
- Siemens Mobility delivered the first of our next generation light rail vehicles in June, with a total of 152 vehicles expected over the coming five years, more than doubling our current capacity by 2024.
- We awarded $40 million in System Access Funds to 30 different projects that will make it easier and more convenient to get to transit.

Contents

Long-Range Financial Plan

Long-Range Financial Plan 1
- Sources and Uses 2
- Revenue Sources 4
- Expenditures 8
- Financing 12
- LRFP Analysis 14

2020 Budget

2020 Budget Overview 17
- Business Planning and Performance Management 17
- Department Budgets 19
- Agency Staffing 19

Transit Modes Summary 21
- Link Light Rail 22
- Sounder Commuter Rail 23
- ST Express 24
- Tacoma Link Light Rail 25

Projects Budgets 27
- Project Budget Summary 27
- System Expansion 27
- Enhancement 32
- State of Good Repair 35
- Administrative 36

Other Budgets Summary 37

Transit Improvement Plan

Transit Improvement Plan 39
- Project Budgeting 39
- Projects Summary 40
- Closed Projects 41
- Transit Modes Summary 42
- Reserves Summary 43

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Appendices

Appendices 45
Appendix A – Sound Transit 2 and Sound Transit 3 Cost Estimates 45
Appendix B – Sound Move Project Budgets 47
Appendix C – Glossary 48
Appendix D – Transit Improvement Plan Project Detail Pages 57
- **System Expansion** 59
- **Link** 59
- **Sounder** 71
- **Regional Express** 81
- **Stride** 87
- **Other** 91
- **Enhancement** 101
- **State of Good Repair** 125
- **Administrative** 139

Alphabetical Index of Projects by Mode

LINK LIGHT RAIL

Access Control Card Upgrade 700695 131
Convention Place Development Systems Retrofit 400046 127
Downtown Redmond Link Extension 4X630 70
DSTT Capital Improvements 400116 127
DSTT Single Tracking 400117 66
East Link Extension 4X600 69
Enhancements to Tacoma Link Extension 400034 63
Escalator Modernization Program 400122 105
Everett Link Extension 400052 63
Federal Way Link Extension 4X445 69
First Hill Streetcar 400007 61
Hilltop Tacoma Link Extension 400008 61
Kinkisharyo LRV Systems Upgrade 700655 129
Light Rail Vehicle Fleet Expansion 400032 62
Light Rail Vehicle Overhaul 700769 133
Light Rail Vehicle Wireless Communication Upgrade 700684 108
Link Bridge Repairs 700705 132
Link CCTV System Upgrade 600033 128
Link Light Rail Vehicle Overhaul 700677 130
Link Radio Upgrade 700704 131
Link Station Braided Tile Replacement 700728 133
LRV Between Car Barriers 700697 110
LRV Wash Bay Modifications 700713 111
Lynnwood Link Extension 4X115 67
NE 130th Street Infill Station 400115 65
Noise Abatement 4X340 105
Non-revenue Support Vehicles 700781 112
North Corridor MOW 4000113 65
Northgate Link Extension 4X100 66
Northgate Link Extension Project Reserve 4X199 67
OMF Energy Efficiency 700706 110
Operations and Maintenance Facility East 400009 62
Operations and Maintenance Facility Light Rail Vehicle Lift 700730 111
Operations Maintenance Facility (OMF) Expanded Parking 700692 109
Operations Maintenance Facility (OMF) Link Control Center (LCC) Upgrades 700691 108
Operations Maintenance Facility (OMF) Renovations 700693 109
OT Virtual System Hardware Upgrade 700652 128
SeaTac Airport Wrong Door Fall Protection 700651 106

SeaTac Airport Second Elevator 700654 107
Signage Improvements 700793 112
South 200th Link Extension 4X420 68
Tacoma Dome Link Extension 400053 64
Tacoma Link Fare Collection 600029 106
Tacoma Link HVAC and Building Systems Upgrade 700682 130
Tacoma Link Light Rail Vehicle Overhaul 700718 132
Tacoma Link Radio Upgrade 700676 107
University Link Extension 4X200 68
West Seattle and Ballard Link Extensions 400066 64
Wheel Truing Machine 700657 129

SOUNDER COMMUTER RAIL

Auburn Station Parking and Access Improvement 300040 77
Customer Emergency Stations 700708 113
D St – M St Track and Signal 3X135 78
Edmonds and Mukilteo Stations Parking & Access Improvements 300087 78
Kent Station Parking Lot Paving 700727 116
Kent Station Platform Lighting 700726 116
Kent Station Parking and Access Improvements 300035 76
Lakewood Station Improvements 300019 74
Locomotive Inboard Cameras 700710 114
Mukilteo Station, S Platform 3X206 79
Point Defiance Bypass 300027 76
Positive Train Control 300011 113
Puyallup Station Parking and Access Improvements 300017 73
Puyallup Station LED Lighting 700724 115
Sounder Maintenance Base 300004 73
Sounder Passenger Emergency Intercom 700711 114
Sounder South Expanded Service 3X510 80
Sounder Fleet Expansion 7X755 80
Sounder Vehicle Overhaul Program 700770 134
Sounder Yard Expansion 300026 75
South Sounder Capacity Expansion 300056 77
Sumner Station Parking and Access Improvements 300018 74
Sumner Station LED Lighting 700725 115
Tacoma Trestle Track & Signal 300021 75
Tukwila Station 3X236 79

REGIONAL EXPRESS

Bus Base South 500005 83
Bus Maintenance Facility 5X261 117
Bus on Shoulder 500086 83
Community Transit – On-Board Communication Upgrade 700690 118
I-90 Two-Way Transit and HOV Operations, Stage 3 5X387 85
North Sammamish Park-and-Ride 500117 85
Pacific Ave SR 7 Bus Rapid Transit 500111 84
Pierce Transit – Global Positioning System Repeater 700689 117
RapidRide C and D 500110 84
Station Midlife Refurbishment Program 700771 134
ST Express Fleet Expansion 700720 86
ST Express Fleet Replacement 7X701 135

STRIDE

Bus Base North 500070 90
I-405 Bus Rapid Transit 500050 89
SR 522/NE 145th Street BRT 500051 89

OTHER

Administrative Capital 802000 142
Agency Administration Operating 0X002 141
Bike Parking Program 600080 118
Design Criteria Management Update 600145 120
Downtown Seattle and Regional Mobility Improvements 700723 123
Efficiency and Sustainability Program 600132 96
Environmental Remediation 600143 97
Environmental Mitigation, Monitoring and Maintenance 600025 141
Everett Station Security Improvements 700685 141
Fare Administration 600016 94
Fare Collection 3X212 93
Information Technology (IT) Infrastructure 870100 136
Information Technology Program 803800 142
Innovation and Technology Program 600076 96
IT Transit Systems 870101 137
LED Lighting Program 700688 123
Next Generation ORCA 600038 94
Parking Management Program 600133 120

Passenger Information Management System 600084 119
Research and Business Development Program 600039 95
Research and Technology 5X410 93
Security Operations Center – Video-Monitoring Improvements 700687 122
Security Radio System 700686 122
Small Works Program 7X740 136
SODO/MLK Hazard Mitigation 600085 119
ST3 Planning 809100 99
ST*art* 6X668 98
ST*art* Operations and Maintenance 600668 97
Tacoma Dome Station 7X356 135
Transit Oriented Development Planning Program 804302 99
Transit Oriented Development Property Disposition 804100 98
Transit System Access Program 600073 95
Union Station Garden Level Remodel 700736 124
Video Management System Upgrade 700665 121

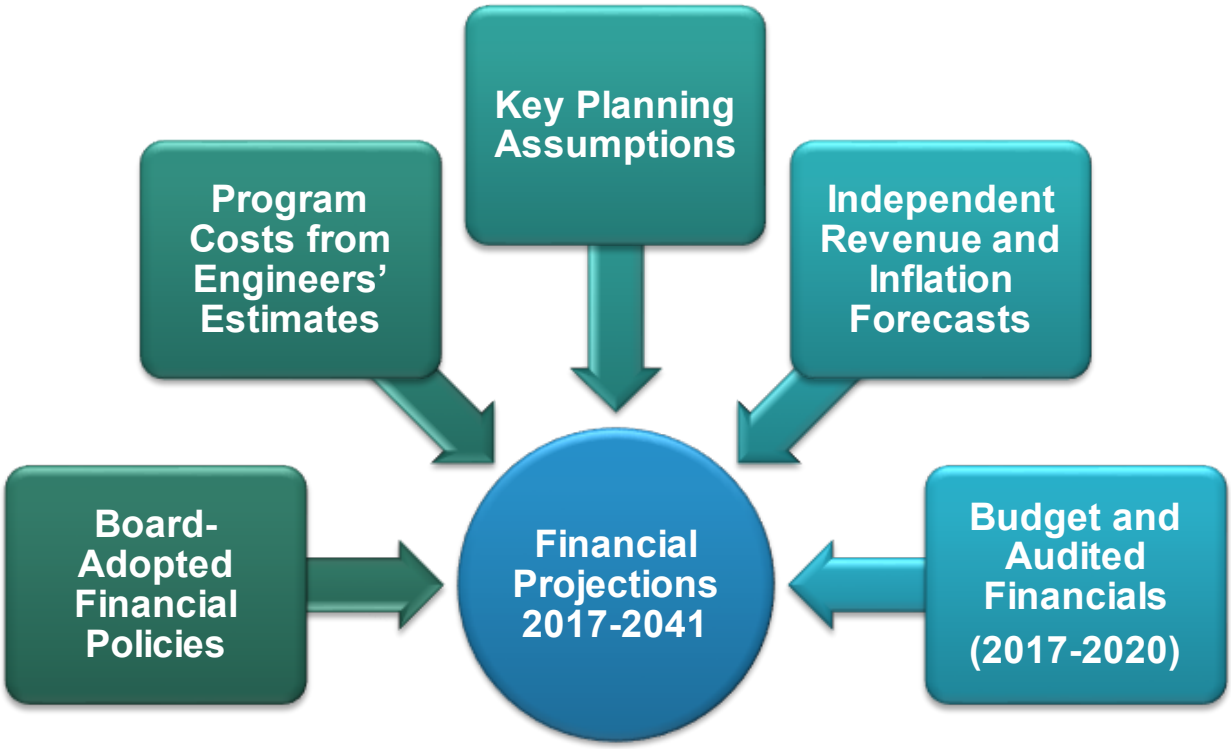
Long-Range Financial Plan

Sound Transit's Long-Range Financial Plan (LRFP) reflects the agency's mission to implement affordable high-capacity transit programs approved by voters in 1996 Sound Move (SM), 2008 Sound Transit 2 (ST2), and 2016 Sound Transit 3 (ST3). The LRFP assumes completion of all voter approved capital projects by 2041 and provides sufficient funding to ensure continued operation and maintenance of the transit system thereafter.

The LRFP is produced in accordance with the Federal Transit Administration's (FTA) "Guidance for Transit Financial Plans" and is maintained on a cash basis. It states and projects all agency sources and uses of funds for the period 1997-2060 with special focus on 2017-2041 which is the ST3 start to completion time period, including the agency's operating statements, sources and uses statements, debt amortization, and capital replacement funding schedules for the period 1997-2060. It incorporates the agency's most current proposed or Board-adopted operating budget and long-term capital and operating financial projections for Regional Express, Sounder commuter rail, Link light rail, Tacoma Link light rail, and Stride Bus Rapid Transit as included in the Sound Move, ST2, and ST3 voter-approved programs.

At the heart of the LRFP is the 2017-2041 financial projections model. This model incorporates all financial policies, assumptions, revenue forecasts, and program cost estimates needed to calculate cash flow, debt financing, and key performance indicators (e.g., cash balances and debt service coverage ratios) over the long-range planning horizon. The diagram below illustrates the concept of this model.

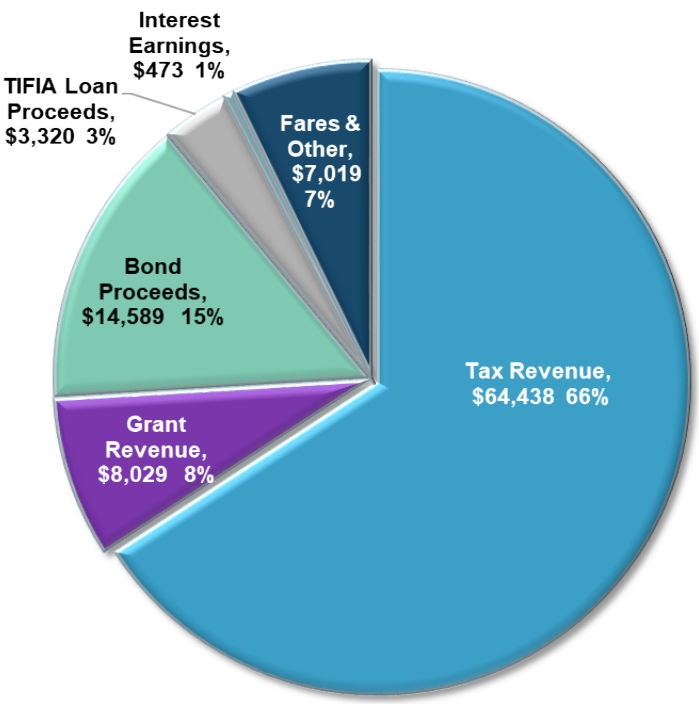
KEY ELEMENTS OF THE LONG-RANGE FINANCIAL PLAN



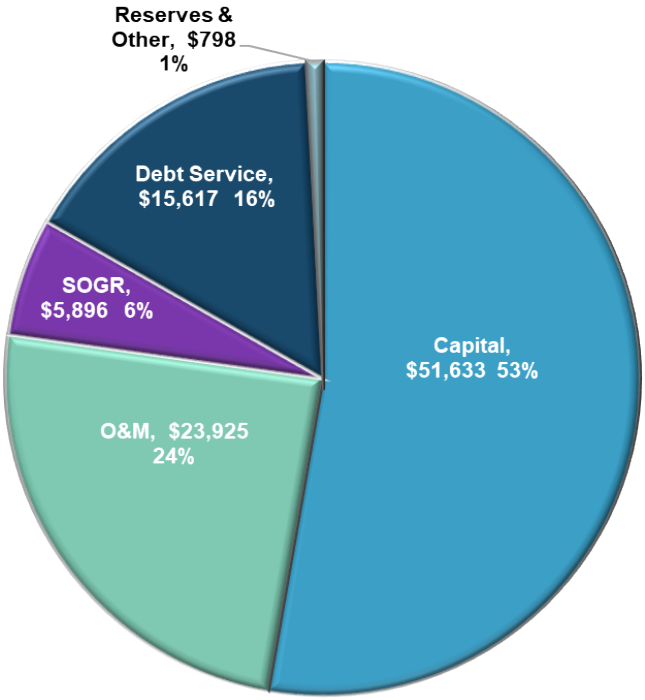
Sources and Uses

Agency sources and uses (2017—2041) are shown below.

SOURCES OF FUNDS $97.9B
(YOE$ in millions)



USES OF FUNDS $97.9B
(YOE$ in millions)



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Financial Plan - Sources & Uses Summary

2019 Fall Financial Plan

2017 through 2041; YOE Dollars in Millions

	Snohomish	North King	South King	East King	Pierce	System-wide	Total
Sources of Funds							
Tax Revenues							
Sales and Use	6,258	16,084	6,962	12,704	9,054	-	**51,062**
MVET	1,245	1,852	1,105	2,464	1,773	-	**8,439**
Property Tax	514	1,737	527	1,442	623	-	**4,842**
Rental Car Tax	4	10	70	6	5	-	**96**
Total Tax Revenues	**8,021**	**19,683**	**8,664**	**16,615**	**11,455**	**-**	**64,438**
Other Revenue							
Grant Revenue	1,537	2,081	1,438	1,424	993	557	**8,029**
Fare Revenue	474	3,740	877	955	670	-	**6,717**
Other Revenue	14	141	30	73	34	11	**302**
Interest Earnings	-	-	-	-	-	473	**473**
Total Other Revenue	**2,025**	**5,961**	**2,345**	**2,452**	**1,697**	**1,041**	**15,521**
Bond Proceeds (with DSRF)	2,496	6,621	3,449	1,461	564	-	**14,589**
TIFIA Proceeds	471	1,088	926	836	-	-	**3,320**
Total Sources	**13,013**	**33,353**	**15,383**	**21,363**	**13,716**	**1,041**	**97,869**
Uses of Funds							
Capital Expenditures (Including Service Delivery)							
Light Rail Transit	7,814	13,279	4,579	9,642	2,587	4,605	**42,506**
Tacoma Link	-	-	-	-	1,216	-	**1,216**
Commuter Rail	109	-	1,081	-	2,169	-	**3,359**
Regional Express Bus	136	90	120	340	324	-	**1,009**
Bus Rapid Transit	44	443	267	1,304	7	-	**2,065**
System-wide	18	104	42	70	15	1,078	**1,326**
Service Delivery	20	17	35	38	39	1	**151**
Total Capital Expenditures	**8,142**	**13,933**	**6,123**	**11,393**	**6,357**	**5,685**	**51,633**
O&M Expenditures							
Light Rail Transit	998	6,934	2,192	1,695	382	-	**12,201**
Tacoma Link	-	-	-	-	583	-	**583**
Commuter Rail	343	-	934	-	1,024	-	**2,301**
Regional Express Bus	622	-	408	1,779	1,214	-	**4,022**
Bus Rapid Transit	136	252	178	707	-	-	**1,274**
System-wide*	315	456	250	382	232	1,909	**3,544**
Total O&M Expenditures	**2,413**	**7,642**	**3,963**	**4,562**	**3,436**	**1,909**	**23,925**
SOGR	368	1,639	973	1,298	891	726	**5,896**
System-Wide Activities	948.7	2,353.9	1,036.3	1,991.3	1,362.9	(7,693.1)	**-**
Reserve Contributions (O&M, R&R, DSRF)	207	556	294	157	81	0	**1,295**
Debt Service (Excludes TIFIA)	1,942	5,563.90	3,041	2,060	784	-	**13,391**
TIFIA Debt Service	311	780	687	449	-	-	**2,226**
Change in Cash	(1,318)	885	(733)	(548)	804	414	(497)
Total Uses	**13,013**	**33,353**	**15,383**	**21,363**	**13,716**	**1,041**	**97,869**

**Includes Other O&M and Emergency Reserve*

Revenues Sources

Revenue sources for 2017–2041 of $97.9 billion include tax revenue, grant revenue, fare revenue, interest earnings, and other revenue, such as advertising, real estate sales proceeds, rental income, and local contributions. Debt issuances in the form of bonds and Transportation Infrastructure Financing and Innovation Act (TIFIA) loans are used to bridge projected gaps between available revenues and expenditures.

Tax Revenue

Forecasting tax revenues for the Sound Transit district presents unique challenges, as the agency's jurisdictional boundary does not correspond to any other economic reporting entity. The district includes incorporated and unincorporated areas in three counties: King, Pierce, and Snohomish.

Sound Transit receives tax base forecasts for Retail Sales and Use Tax (sales tax) and Motor Vehicle Excise Tax (MVET) from an independent 3rd party. The sales tax and MVET tax base forecasts are grounded on economic and population projections from the Puget Sound Economic Forecasting Model, a regional econometric model of King, Pierce, Snohomish, and Kitsap counties. The variables used to predict taxable retail sales include Puget Sound personal income, housing permits, and the unemployment rate, among other variables. The MVET tax base is forecast based on predictions of motor vehicles by type, driving-age population and the unemployment rate, as well as the expected average value of motor vehicles. Tax base forecasts are then allocated to each of the five Sound Transit subareas based on actual historical data from the State Department of Revenue and the State Department of Licensing.

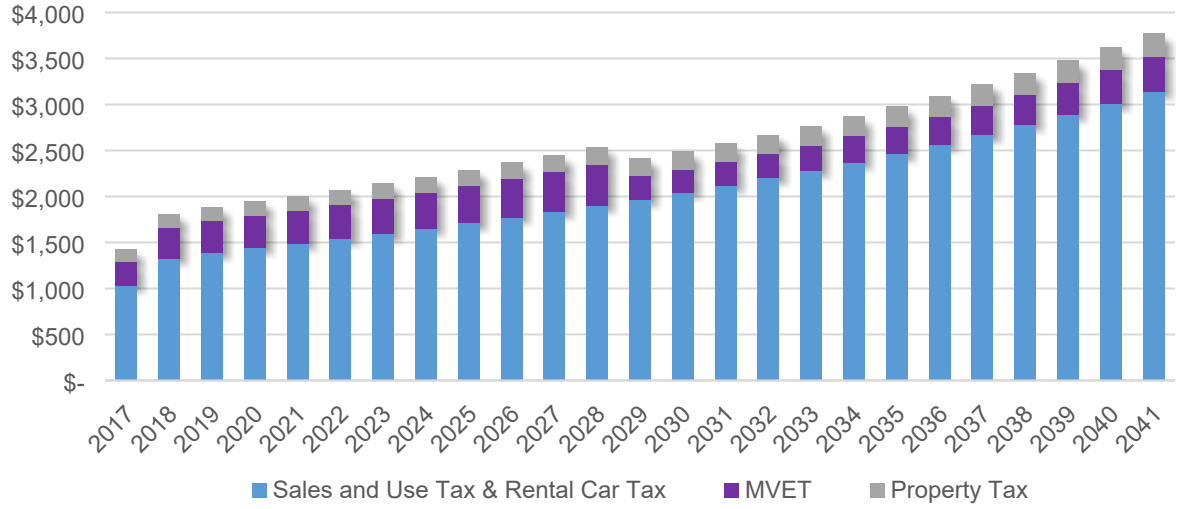
For the property tax forecast, an independent 3rd party projects the growth of assessed value (AV) for both existing property and new construction within the Sound Transit district.

Assumptions:

- Sales Tax Rate: 0.4 percent 1997–2009; 0.9 percent 2009–2017; 1.4 percent 2017–2041 (subject to potential sales tax rollback after 2041). Average Annual Tax Base Growth: 4.1 percent 2017–2041.
- MVET Tax Rate: 0.3 percent 1997–2028 (tax ends in 2028), 0.8 percent 2017–2041 (updated depreciation schedule 2029–2041). Average Tax Base Growth: 3.6 percent 2017–2041.
- Rental Car Tax Rate: 0.8 percent. Average Tax Base Growth: 0.4 percent 2017–2041.
- Property Tax Rate: Up to $0.25/$1,000 AV. Average AV growth: 5.0 percent 2017–2041.

Projected tax revenue of $64.4 billion comprises two-thirds of all revenue sources over 2017—2041.

TAX REVENUE 2017—2041
(YOE$ in millions)



Grant Revenue

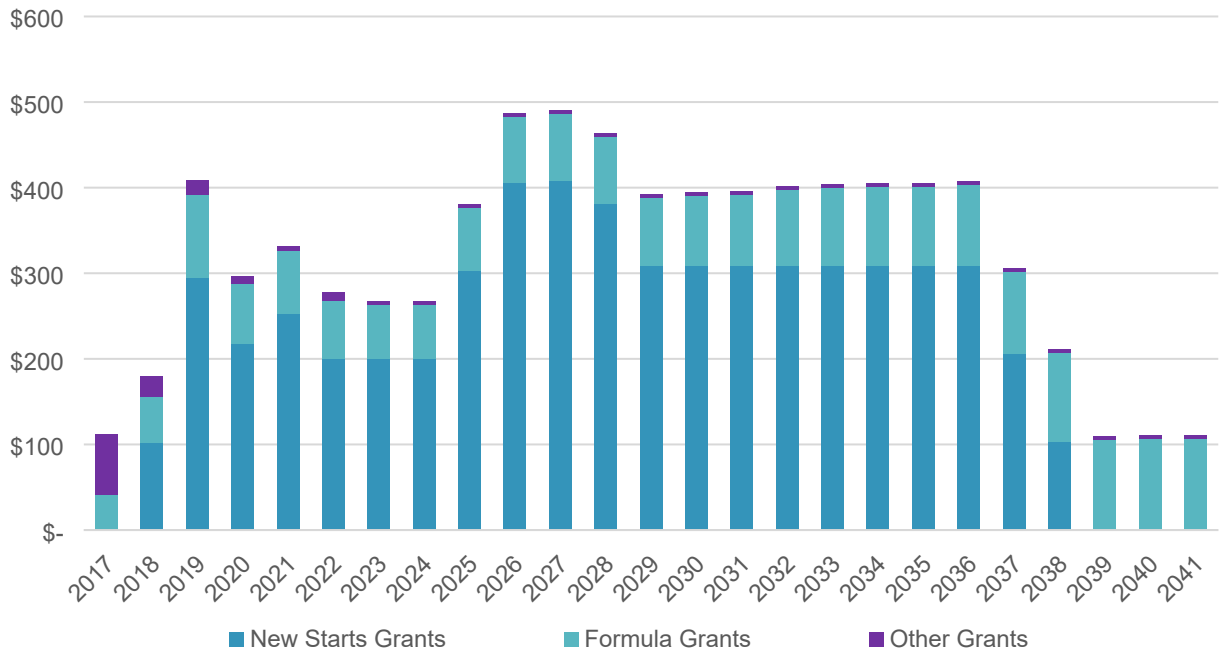
Federal funding is generally secured through Federal Transit Administration (FTA), Federal Highway Administration (FHWA), and Federal Railroad Administration programs currently authorized under the Fixing America's Surface Transportation (FAST) Act and future authorizations. Funding is projected to be secured through both congressional appropriations and regional/national grant competitions. Multi-year funding awards are provisional and subject to annual Congressional budget appropriations.

Assumptions:

- Sound Transit is projected to receive $8.0 billion in grant revenues 2017–2041.
- Tacoma Hilltop Link Extension was awarded a $75 million Small Starts Grant Agreement.
- Lynnwood Link Extension was awarded a FFGA of $1.2 billion.
- Federal Way Link Extension projected to receive FFGA of $790 million.
- Future ST3 FFGAs projected to receive $3.7 billion in FFGAs.
- $2.1 billion in Formula Funds projected to be earned from 2017–2041.

Total projected grant revenue of $8.0 billion by grant type is shown on the following graph.

GRANT REVENUE 2017—2041
(YOE$ in millions)



Ridership and Fare Revenue

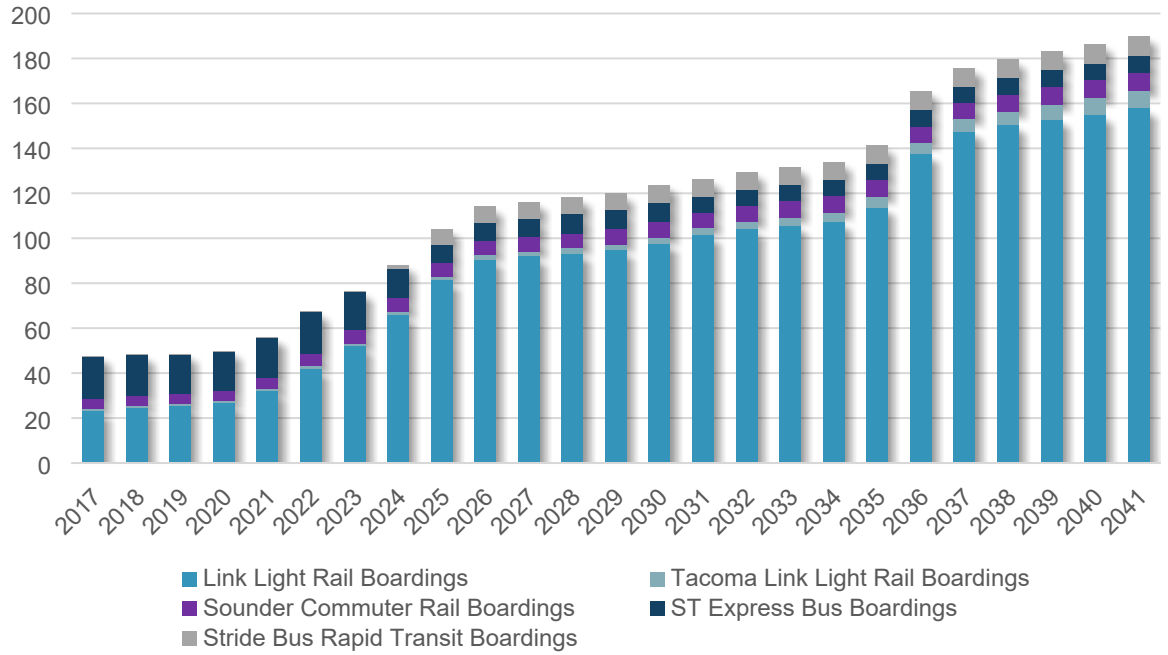
Fare revenues are a product of transit ridership and fare prices. Ridership, in turn, is a result of transit service provided, as well as a number of other factors. In the near term, ridership can be estimated based on past trends and the amount of transit service to be provided (e.g., routes, service frequency, parking capacity at park-and-ride facilities, etc.).

Ridership

For long-range ridership forecasts, the Sound Transit travel demand forecasting model is used. In this model, transit ridership forecasts are based on observed origins and destinations of transit riders, observed transit line volumes, and a realistic simulation of observed transit service characteristics. The model is executed in three stages. In Stage 1, regional changes in demographics (households and employment) are taken into account.

In Stage 2, changes in transit and highway travel times, which reflect congestion levels, and cost factors such as parking costs, transit fares, and household income are taken into consideration. In Stage 3, incremental changes to the transit network, such as the addition of light rail services offered, are incorporated and a forecast of zone to zone transit trips, is prepared for the region. Each light rail alternative ridership forecast is paired with a comparable baseline ridership forecast in order to measure the impact of incremental changes in the transit network.

RIDERSHIP BY MODE 2017—2041
(in millions)



Fare Revenue

The LRFP assumes the agency continues to collect fare revenues from Sound Transit operations for ST Express bus, Link light rail, and Sounder commuter rail. Fare collection for Tacoma Link is assumed to begin when the Tacoma Link Expansion opens in 2022, and Stride will collect fares when the two Stride projects open in 2024. One Regional Card for All (ORCA) is a stored value smart card used for payment of public transit fares in the central Puget Sound. Fare revenue forecasts are based on ridership forecasts and assumptions regarding fare levels and price elasticity.

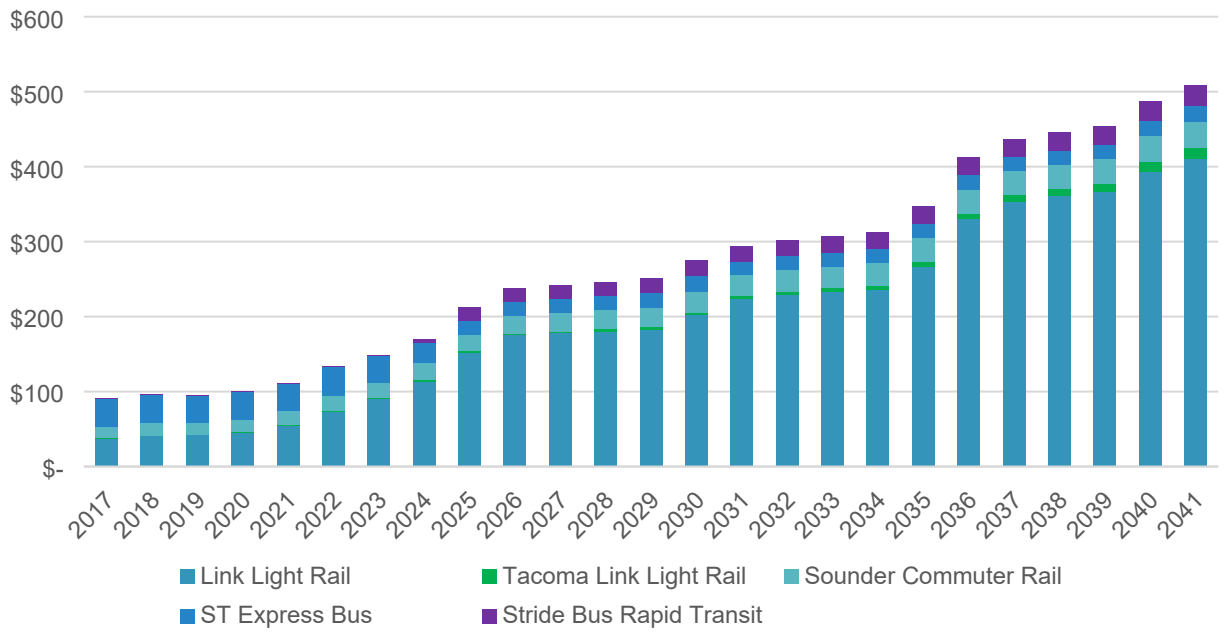
Assumptions:

- Sounder and Link light rail fares are structured with a base fare plus a distance based charge per mile traveled.
- ST Express bus fares are projected to be comparable to bus fares of other transit agencies serving the three counties. Fares paid with ORCA card receive a two-hour transfer credit for the fare paid.
- Senior, ORCA LIFT and youth fares are set lower than the standard Adult fare.

- Fare changes will occur as necessary to comply with board approved farebox recovery requirements.

Allocation of regional fare revenue to Sound Transit from collections through the ORCA card system are based on an inter-local agreement reached between Sound Transit, Community Transit, Everett Transit, King County Metro, Pierce Transit, Everett Transit, Kitsap Transit, and Washington State Ferries.

FARE REVENUE 2017—2041
(YOE$ in millions)



Interest Earnings

In accordance with Sound Transit financial policies, interest earnings are credited, at the agency level, to offset expenditures for system-wide programs.

Assumption:

Sound Transit will earn a 2.0 percent rate of return on General Fund cash balances and reserve fund balances throughout the planning horizon of 2041.

Other Revenue

Other revenue includes advertising, real estate sales proceeds, rental income, permit parking revenues, and local contributions. Local contributions include funds that are either granted directly to Sound Transit or are provided as a credit against taxes or fees that would otherwise be levied on construction activities by other jurisdictions or organizations. The agency has commitments from other jurisdictions and organizations for providing funds for ST Express bus, Link light rail, and Sounder commuter rail projects. Such revenues are included in the LRFP subsequent to executed agreements with the jurisdictions which are contributing the funding.

Expenditures

Expenditures in the LRFP include operations and maintenance, capital, state of good repair (SOGR), contribution to reserves, and financing.

Inflation Forecasting

Sound Transit uses three inflation indices in the LRFP to escalate projected costs over time:

- Consumer Price Index (CPI-U Seattle) is applied to Operations and Maintenance expenses, and "soft" capital costs, excluding construction-related elements and property acquisitions, and is produced by an independent 3rd party;
- Construction Cost Index (CCI) is applied to construction-related elements of the capital program (including state of good repair), and a Seattle-area forecast of the CCI index is produced by an independent 3rd party;
- Right-Of-Way Index (ROWI) forecast is applied to property acquisition costs using an assessed valuation forecast for the Sound Transit District produced by an independent 3rd party.

Assumptions:

- CPI Annual Cost Inflation* 2017–2041: 2.3 percent.
- CCI Annual Cost Inflation* 2017–2041: 3.6 percent.
- ROWI Annual Cost Inflation* 2017–2041: 4.6 percent.

*based on compound annual growth rate

SOUND TRANSIT INFLATION INDICES – CONVERSION FROM 2017$ (2017 = 1.0)

Operations and Maintenance

Sound Transit services currently consist of four transit modes: Link light rail, Sounder commuter rail, ST Express bus, and Tacoma Link light rail. The voter-approved ST3 plan includes a fifth mode: Stride Bus Rapid Transit. These modes are managed by the Sound Transit Operations Department. Each year, Sound Transit's Service Planning Division prepares a Service Implementation Plan (SIP) to guide the delivery of these modes. The total operations and maintenance (O&M) cost comprises forecasts for each mode and system-wide operating costs.

Transit Modes

Operations and maintenance (O&M) costs are projected by each transit mode as part of the annual budget process, taking into account all scheduled service expansions as laid out in the Transit Improvement Plan (TIP).

The O&M cost forecasts for each mode are based on a cost build-up model for each function (such as vehicle operations, vehicle maintenance, and facilities maintenance). The modal forecasts also include the cost of Sound Transit staff and other administrative expenses allocated to transit modes. Each cost category is forecasted using different metrics (such as platform hours, number of vehicles, number of stations, etc.). The relevant metrics are based on historical data, current year budget data, and other available information.

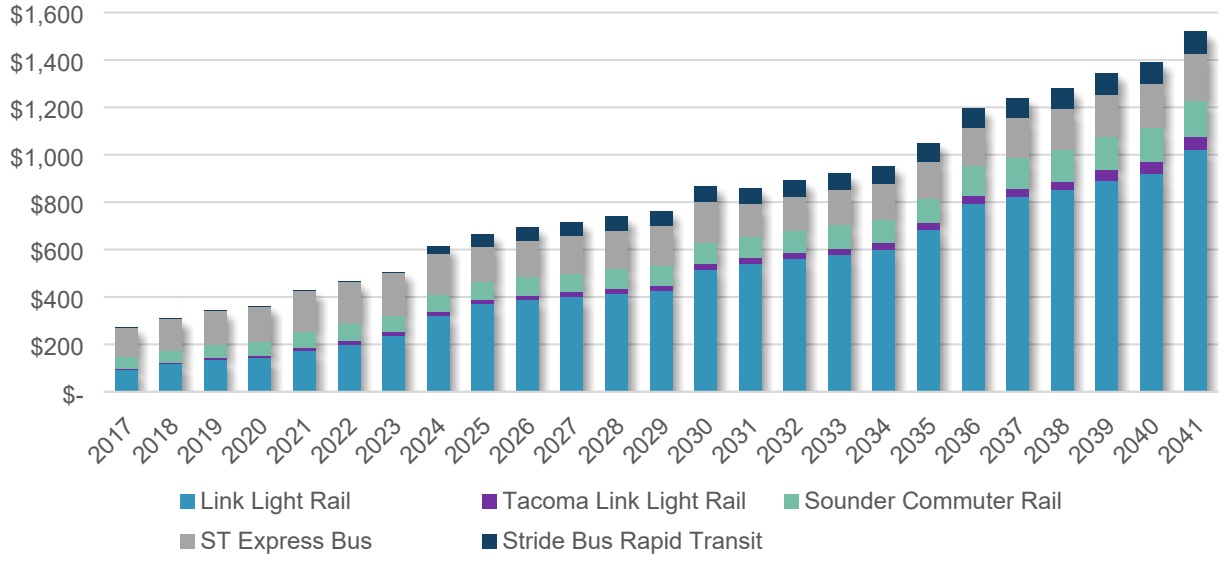
Non-labor operating costs are inflated using the Consumer Price Index (CPI-U Seattle). Labor costs are inflated using CPI-U Seattle increased by ten basis points. Some purchased transportation costs are inflated at a higher rate based on historical experience or known contract increases.

System-wide Operations & Maintenance (O&M) Costs

Other operating costs in the LRFP which are not specific to a transit mode include the following:

- Administrative costs related to Sound Transit's capital program. These are costs from capital project staff that are not directly charged to the capital project. They include items such as sick and vacation time that are not considered a direct project capital cost.
- Revenue collection fees: The state of Washington charges Sound Transit revenue collection fees on sales and use tax, rental car tax, and motor vehicle excise tax. The forecast of these fees is included in the system-wide category.
- Emergency Loss Fund: This fund includes reserves for uninsured capital and operating losses. The Board authorizes the use of the emergency/loss fund on a case by case basis.
- Sales and Use Tax Offset Fee: As required by RCW 81.112, Sound Transit must remit to the Washington Department of Revenue a fee of 3.25% on construction contracts for ST3 projects, until a total of $518 million is paid.
-

TRANSIT MODES OPERATIONS AND MAINTENANCE COSTS 2017—2041
(YOE$ in millions)



Capital

The LRFP capital spending plan consists of seven categories. These include Sound Transit's five transit modes: Link light rail, Tacoma Link light rail, Sounder commuter rail, Regional Express, and Stride Bus Rapid Transit. Additionally, there are two other categories of capital projects: "system-wide" which includes projects that benefit the agency (such as the Transit Oriented Development Planning Program), and "service delivery" which includes projects that support the delivery and operations of service, such as Signage Improvements.

The capital plan in the LRFP includes capital expenditures adopted in the Sound Move, ST2, and ST3 voter-approved programs. Capital expenditures include funding for projects detailed in the TIP, as well as projected future expenditures. The TIP contains dollars allocated to board-approved projects which have gone through the budget process. Beyond that, future capital expenditures comprise remaining projected spending on projects that do not have baseline budget established by the board. Voter-approved costs in constant dollars for system-expansion projects are published in constant dollars (2019$) in Appendix A.

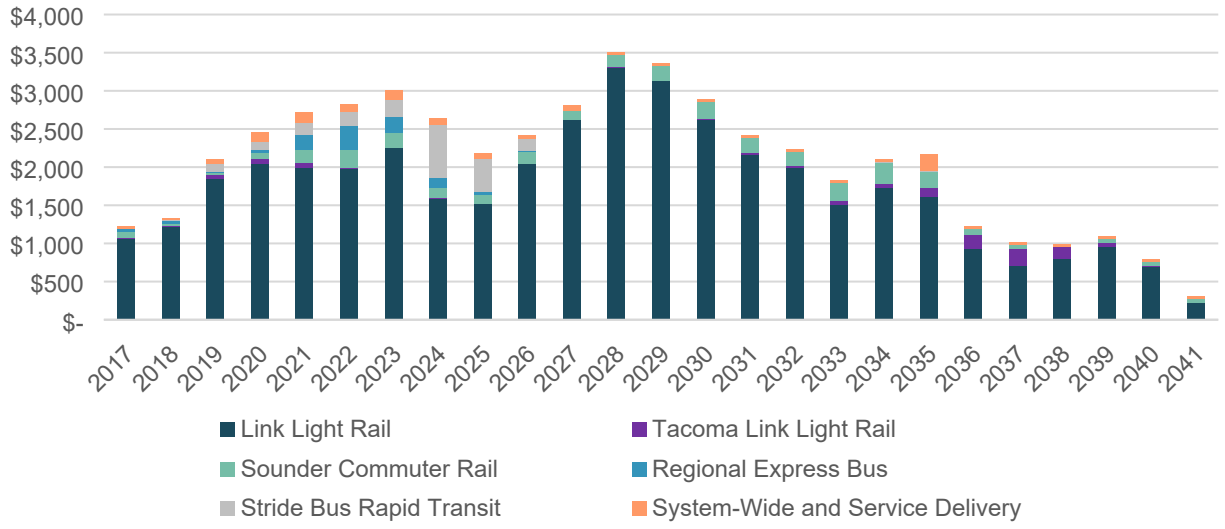
For system expansion projects that do not have a baseline budget, future expenditures are forecasted by inflating the voter-approved cost using Sound Transit inflation indices and an internal cash flow. This is an estimate of the capital cost for each project until the Board establishes the baseline budget.

As shown the graph below, light rail expenditures make up the vast majority of the capital spending plan from 2017 to 2041. The high points in 2022 and 2028 represent the highest points of capital spending for the ST2 and ST3 programs respectively.

System-wide Activities

Sound Transit's capital and operating programs include funding for projects that are regional in scope, including but not limited to: high-capacity transit studies; innovation and technology fund; Phase 4 planning; transit-oriented development studies; efficiency and sustainability fund; research and technology; fare integration and administration; and agency administration capital and operating projects.

CAPITAL EXPENDITURES BY MODE 2017— 2041
(YOE$ in millions)



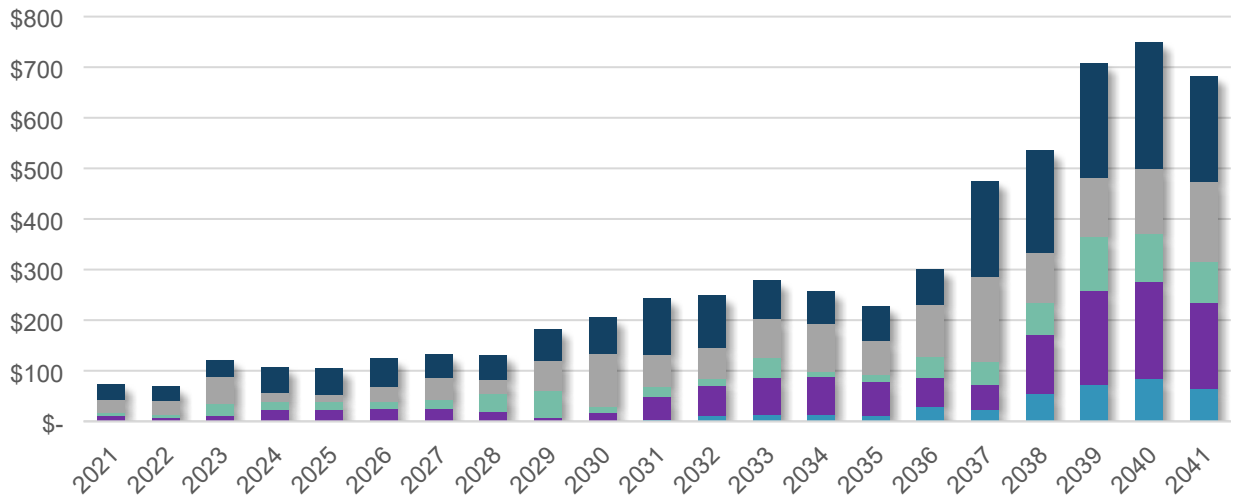
State of Good Repair

The LRFP projects expenses for the repair and replacement of key operating assets through State of Good Repair (SOGR) funding. Annual costs of future asset replacement and mid-life maintenance activity are calculated for each class of asset based on original cost, in-service date, estimated asset life, and other financial factors.

The annual payment calculation assumes that 100 percent of replacement costs will be funded by Sound Transit revenues. A $300 million capital reserve fund has been set aside in the LRFP projections with an annual 2.0% interest rate assumption on any earnings.

The replacement date for assets follows generally-accepted principles for the useful life of transit facilities and equipment. For buses the industry standard is a twelve year replacement cycle, for Sounder and Light Rail vehicles, the cycles are from "Methodology for Projecting Rail Transit Rehabilitation and Replacement Capital Financing Needs," by Robert L. Peskin, published in the Transportation Research Record 1165. State of Good Repair prior to 2021 is included in the capital section of the LRFP model.

STATE OF GOOD REPAIR BY ASSET CATEGORY
(YOE$ in millions)



Contribution to Reserves

The agency maintains reserves to meet agency-wide revenue shortfalls or cost increases, including an operations & maintenance reserve fund, bond reserve fund, emergency loss fund, and capital replacement reserve fund.

Assumptions:

- O&M Reserves equal to two months of O&M costs.
- Principal Set-Aside for Bond Reserves: 7.15 percent.
- Cash is managed so that a minimum $5 million operating balance is maintained in the General Fund at all times.

Financing

Financial Policy

The agency uses short-term debt to bridge the gap between the timing of expenditures and the receipt of revenues. The current LRFP forecasts $14.6 billion in bonds will be issued from 2017-2041. Additionally, the plan forecasts $3.3 billion in federal loans under the Transportation Infrastructure Finance and Innovation Act (TIFIA), of which $2.7 billion have been executed and the remaining $600 million of loans are expected to be executed under the Master Credit Agreement (MCA).

Assumptions:

- All-in Issuance Costs: 1.25 percent of par value.
- Bond Interest Rate: 5.3 percent 2019 – 2060.
- Bond Term: 30 years.
- Interest Only Payment Period on Bonds: First five years.
- Bonds may have a non-level principal amortization structure.

Performance and Ratings

The performance of the agency's financing to date and in the future is evaluated by the agency's credit rating and adherence to debt service coverage ratios and other financial policies. The agency's current bond ratings are as follows: Moody's, Aaa and Aa1 for Senior and Parity bonds, respectively; and Standard & Poor's, AAA for all bonds. The executed TIFIA loans and the MCA have been rated AA+ by Fitch and A+ by Standard & Poor's.

- The agency net coverage ratio reaches a minimum of 2.17 in 2037 and rises thereafter. Adherence to other minimum debt service coverage ratios are detailed in the table below.

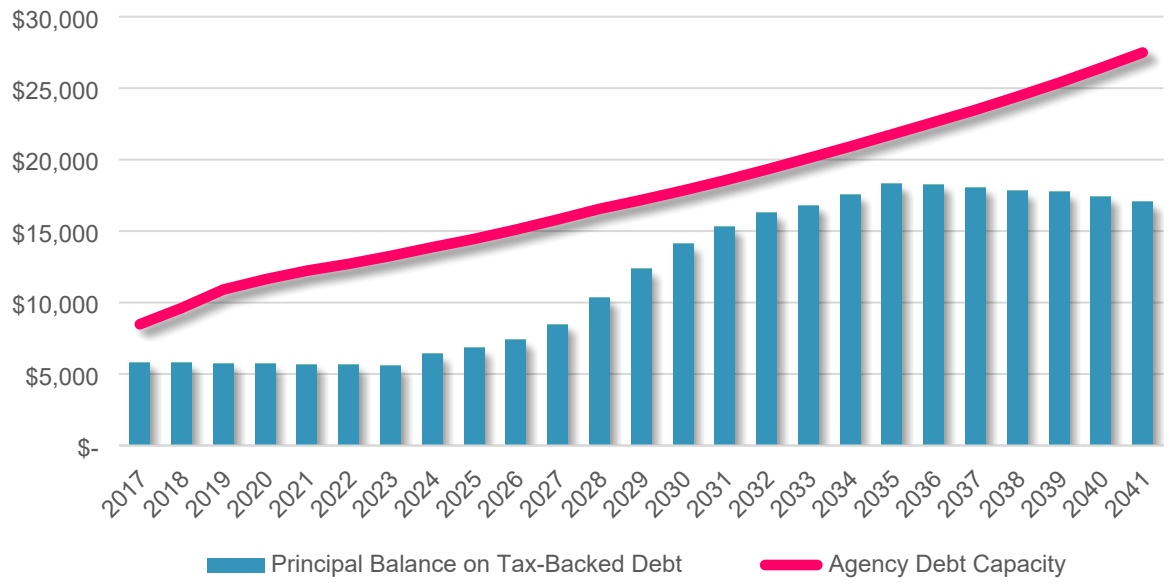
Debt Service Coverage Ratio	Policy Minimum Debt Service Coverage Ratio (DSCR) Requirement	Minimum DSCR Forecasted	Year of Minimum
Net DSCR	1.5X	2.17x	2037
Senior/Prior ABT	2.00x	24.53x	2019
2nd Junior/TIFIA ABT (1.1x Minimum)	1.10x	2.27x	2035
Subordinate/Parity ABT	1.50x	2.27x	2035

Capacity

As described earlier, according to Washington state law, the amount of debt issued by Sound Transit cannot exceed 1.5 percent of the assessed valuation of real property located within the regional transit authority district. An important metric of the agency's financial health is the remaining amount of debt that can be issued, or debt capacity.

- The agency reaches a minimum debt capacity of $3.0 billion in 2032 and rises thereafter.
- The agency reaches a maximum principal debt balance of $18.3 billion in 2035 and declines thereafter.
- The agency will utilize a maximum of 84.3 percent of its total debt capacity in 2032.

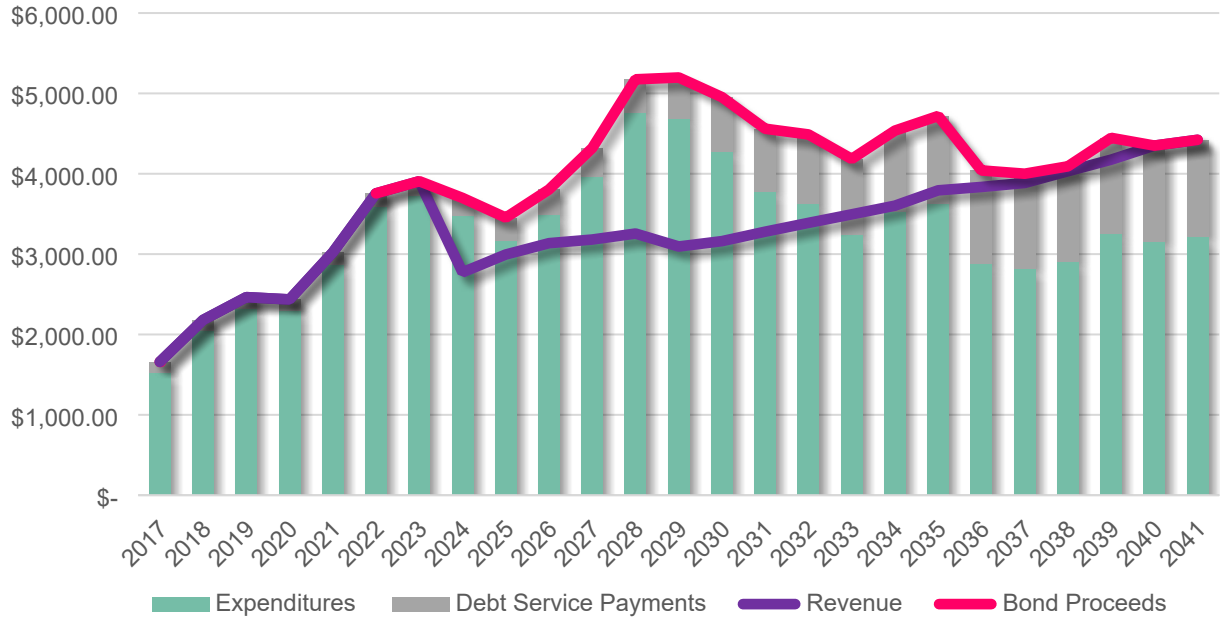
DEBT CAPACITY 2017—2041
(YOE$ in millions)



The following chart summarizes the agency's financing needs, which is based on the gap between revenues and expenditures, through 2041. Total projected revenue is insufficient to fund total expenditures and debt service for the period of 2022 to 2040 during which the majority of agency debt will be issued.

Bond proceeds represent 14.9 percent of total revenue during the period of 2017 to 2041 and are the second largest contributor behind tax revenue, which comprises 65.8 percent of total revenue throughout the same period.

SUMMARY OF REVENUES, EXPENDITURES, AND BORROWING 2017 — 2041
(YOE$ in millions)



LRFP Analysis

The LRFP reflects all assumptions and contingencies as detailed throughout this section and at present meets all criteria stated in the Financial Policies and Controls section of Agency Overview.

Financial Risks

Stress tests are regularly conducted on the LRFP in order to assess the extent to which the agency's plans are susceptible to not being fully met due to external risk factors. Completion of a series of these tests has confirmed that, at the agency level, Sound Transit has sufficient financial flexibility to withstand significant adverse financial shocks. However, on a stand-alone basis, individual subareas are more susceptible to negative financial developments than the agency as a whole.

Key Risk Areas

Federal Funding: The LRFP assumes New Starts Funding including $790 million for Federal Way Link Extension and $3.7 billion for future FFGA projects.

Local Tax Revenue Growth: Sound Transit primarily relies on an independent forecaster for its local tax bases. The tax revenue forecast projects continued improvement through 2019 then stabilizes thereafter. The forecast included in the LRFP does not predict economic cycles. However, long-term economic forecasts are inherently uncertain and actual economic growth in the region could be lower than the current forecast. If revenue growth were to fall below the current forecast, the agency's revenue collections as well as its long-term bonding capacity would be reduced. A significant reduction in local tax revenues would have a negative impact on the agency's financial condition.

Interest Rates: The LRFP assumes that the agency can borrow at 5.3 percent interest on its long-term bonds. If borrowing rates were to rise above this level for a prolonged period of time, the cost to borrow and service debt could increase to the point that the agency's capacity to borrow additional funds would be negatively impacted. Although current interest rates are relatively low, various factors may cause interest rates to rise in the mid-to-long term.

Inflation: The Puget Sound region has experienced relatively mild price increases for general goods and services. The CPI-U is currently low and is projected to remain in the 2.0 percent to 2.7 percent range through 2041. However, the region has experienced high property appreciation and construction prices also appear to be higher than prior periods.

The LRFP incorporates long-term consumer price, construction cost, and real estate cost inflation forecasts provided by independent consultants or developed internally using data from external sources. The current forecast projects long term inflation will reflect historically moderate levels. If inflation were to rise significantly beyond this forecast, or if Sound Transit's construction schedules were to be delayed, the agency's capital and operating costs would also rise beyond the current forecast. Historically, retail sales and use tax, the agency's primary revenue source, has risen with general price levels partially mitigating this risk.

Operations and Maintenance Costs: The LRFP utilizes O&M cost build-up models to project costs for Sounder, Link Light Rail, Tacoma Link and ST Express bus services. These models calculate the annual cost associated with providing projected service levels based on the amount of inputs (e.g., staffing, equipment, and materials) needed to provide service at those projected levels. The parameters for these models are developed from experience of both Sound Transit and other transit agencies operating similar services. It is recognized that O&M costs are affected by many factors, including partnership operating agreements and changes in operating efficiency. The cost of fuel, utilities, spare parts, and supplies are subject to change depending on regional and even international market conditions. Adverse changes in these consumables may lead to higher O&M costs than projected in the LRFP, thus reducing financial capacity and flexibility.

Federal Funding Shortfalls

The LRFP assumes full funding of federal grants with recognition of the potential risk that certain grants may not be fully funded. In the event of cost increases or funding shortfalls, there are several mitigation strategies that could be implemented.

Apply savings from bonding: The LRFP uses conservative assumptions regarding bonding and debt coverage, which are appropriate for long-range planning. However, as the agency implements the capital program, it may be possible to apply savings from debt service costs as the projects begin their construction phases.

Changes to financial policies and financial planning assumptions: The agency's financial policies and financial planning assumptions, such as debt service coverage and capital replacement, could be altered within prudent financial parameters in order to make additional resources available.

Construction schedule extended: Delaying the construction schedule of future projects could generate additional resources. In most years, tax revenues increase faster than cost inflation. Another benefit in extending the construction schedule is the postponement of operating costs and debt service costs.

Control O&M costs: If growth of O&M costs increase significantly above inflation, Sound Transit could find alternate providers for services, or reduce the level of service on routes/runs that have high costs and/or low ridership efficiencies.

Sensitivity Analysis / Stress Tests

A series of sensitivity analyses or "stress tests" were conducted to assess the extent to which the agency's ability to fulfill its voter approved mission is at risk due to the impact of external factors on the LRFP.

The impact of several types of potential financial events were tested by examining the impact on the agency debt capacity limit (pursuant to state law) and the net debt service coverage ratio (DSCR). It is agency policy to maintain a minimum agency wide net debt service coverage ratio of 1.5 or greater in any year. Generally, the agency will run out of debt capacity prior to reaching the net debt service coverage ratio of 1.5.

As described earlier, Sound Transit's debt limit is pursuant to state law based on the assessed valuation of real property located within the regional transit authority district. There are two types of bond limits — one for non-voted debt, and the other for voted debt. Sound Transit may issue total outstanding debt in an amount up to 1.5 percent of assessed valuation within its district without special voter authorization. Upon the approval of 60 percent of the electorate, Sound Transit could issue bonds in amounts up to 5.0 percent of assessed valuation.

The stress tests conducted are as follows:

Sales Tax Revenue: How much could sales tax revenues decline before the agency debt capacity available reaches $0 or the net DSCR drops to 1.5, whichever is first?

Sales tax revenues would need to decline approximately $3 billion or 5.9 percent (2017 – 2041) versus the current LRFP before the available debt capacity reaches $0.

Bond Interest Rates: How much could interest rates paid on all agency bonds issued after 2018 increase before the agency debt capacity limit reaches $0 or the net DSCR drops to 1.5, whichever is first?

Interest rates would need to increase to 7.6 percent, up from 4 percent from 2018 to 2020 and 5.3 percent from 2021 to 2060 before the net debt service coverage ratio equals 1.5.

Capital Cost Inflation: How much additional capital spending could the agency absorb beyond current planning estimates before the agency debt capacity limit reaches $0 or the net DSCR drops to 1.5, whichever is first?

The agency could sustain up to $2.8 billion in additional project costs (spread evenly from 2020-2041) before the available debt capacity reaches $0.

Inflation: How much would the Consumer Price, Construction Cost, and Right-of-Way Indices need to increase before the agency debt capacity limit reaches $0 or the net DSCR drops to 1.5x, whichever is first?

In 2021, all three indices would need to increase by an additional 9.3 percent over the current forecast from 2020 (and then increase at the previously forecasted rate from 2029 to 2041) before the available debt capacity reaches $0.

2020 Budget Overview

Business Planning and Performance Management

Sound Transit's executive leadership team establishes strategic priorities with guidance from the Board to implement the agency's mission: *Connecting more people to more places to make life better and create equitable opportunities for all.* The strategic priorities emphasize the agency's core values and focus on the agency's commitment to serving the public, managing finances, cultivating staff, and improving processes.

Departments and project teams set goals and performance measures that align with these priorities to plan, implement, monitor, and continually improve effectiveness and efficiency throughout the agency. This planning is a critical step to ensuring a more strategic and sustainable spending plan.

Budget Summary

The 2020 annual budget includes revenues and financing sources of $2.5 billion and outlays of $3.1 billion.

Sound Transit expects to receive $2.5 billion in revenues and financing sources in 2020, an increase of $52.2 million or 2.2 percent over the 2019 budget, driven by higher taxes, federal grant drawdowns, and state and local contributions. The proposed 2020 annual budget does not currently include any forecasted bond issuance for 2020 or Transportation Infrastructure Finance and Innovation Act (TIFIA) loan proceeds.

The total transit modes budget of $370.0 million is up 4.4 percent compared to the 2019 budget, primarily due to increases in third party costs to operate our modes (purchased transportation), staffing growth, and transit vehicle overhauls. Also, Sound Transit will take full ownership of the Downtown Seattle Transit Tunnel from King County Metro on January 1, 2020, which will increase our costs for insurance and third party costs for public safety and maintenance.

Total project spending is budgeted at $2.5 billion for 2020. Approximately $2.3 billion or 90.8 percent is budgeted to continue with planning, design, and build-out of the capital program. An additional $114.5 million is budgeted to enhance or maintain current operational assets. Administrative projects, which include information technology hardware and applications, administrative costs allocated to projects, and general and administrative expenses, are budgeted at $127.3 million.

Other expenses total $176.8 million for 2020. Of that total, $144.4 million is budgeted for debt service, which includes principle repayments, interest expense, loan amortization, and financing fees. Another $16.7 million is budgeted for fees paid to the Washington Departments of Revenue (DOR) and Licensing (DOL) for the collection and administration of taxes. In addition, a sales and use tax offset fee is paid to the DOR. A $5.0 million cash contribution to the city of Seattle for First Hill Streetcar operating and maintenance expenses is budgeted for 2020. Also, $10.8 million is budgeted for operating contingency.

Lastly, the budget anticipates the use of approximately $0.6 billion of unrestricted cash in 2020 to close the gap between this year's sources ($2.5 billion) and uses ($3.1 billion). The agency's unrestricted cash balance is expected to be $1.3 billion at the end of 2019 and is estimated to be $696 million at the end of 2020.

2020 BUDGET SUMMARY
(in thousands)

	2018 Actual	2019 Budget	2019 Forecast	2020 Budget
Revenues and Other Financing Sources				
Retail Sales And Use Tax	$1,337,601	$1,366,029	$1,391,889	$1,446,228
Motor Vehicle Excise Tax	338,537	335,353	340,176	355,220
Rental Car Tax	3,802	3,757	3,757	3,840
Property Tax	146,284	149,070	149,070	155,500
Federal Grants	169,970	318,373	318,373	332,921
Local & State Contributions	77,937	920	9,155	19,686
Passenger Fare Revenue	96,018	102,564	97,642	100,087
Investment Income	37,801	33,683	57,294	47,915
Miscellaneous Revenues	13,448	12,234	12,234	12,771
Bond & TIFIA Loan Proceeds	56,606	100,000	100,000	0
Total Revenues and Other Financing Sources	**$2,278,003**	**$2,421,983**	**$2,479,590**	**$2,474,167**
Expenses & Outlays				
Transit Modes				
Link	$116,942	$144,420	$138,311	$147,679
Sounder	51,250	56,552	56,416	65,666
ST Express	136,065	148,469	144,442	150,849
Tacoma Link	5,459	4,922	5,379	5,844
Subtotal Transit Modes	**309,715**	**354,362**	**344,549**	**370,037**
Projects[1]				
System Expansion	1,242,457	2,286,270	1,986,533	2,284,877
Enhancement	8,258	35,219	23,538	38,387
State Of Good Repair	11,774	26,961	16,914	76,103
Administrative	84,200	88,573	106,299	127,315
Charges to Transit Modes[2]	(2,659)	(3,899)	(3,899)	(9,377)
Subtotal Projects	**1,344,029**	**2,433,125**	**2,129,384**	**2,517,305**
Others				
Debt Service	**134,272**	**135,007**	**134,609**	**144,387**
Tax Collection & Fees	**6,652**	**9,454**	**10,348**	**16,657**
Cash Donations to Other Governments	**5,000**	**5,000**	**5,000**	**5,000**
Operating Contingency	**-**	**2,046**	**627**	**10,800**
Subtotal Others	**145,924**	**151,506**	**150,584**	**176,844**
Total Expenses & Outlays	**$1,799,669**	**$2,936,948**	**$2,623,889**	**$3,064,186**
Projected Unrestricted Cash Balance as of 1/1/2020				**$1,302,699**
Sources				
Total Revenues and Other Financing Sources				**$2,474,167**
Uses				
Expenses and Outlays				**(3,064,186)**
Reverse Non-Cash Expenses				**(3,792)**
Reserves				**(13,367)**
Projected Unrestricted Cash Balance as of 12/31/2020				**$695,521**

[1]2019 project budgets include budget amendments approved by the Board through September 30, 2019.

[2]Operating projects charged to modes through expense transfers.

Department Budgets

The proposed 2020 budget for Sound Transit departments totals $554.3 million, an increase of $45.9 million or 9.0 percent over the 2019 budget. Major drivers of the increase are higher staffing, operating contingency, and third party rates for purchased transportation services and insurance. Of these, staffing is the largest change. Salaries and benefits increased by $26.0 million or 17.6 percent over the 2019 budget primarily due to a full year of costs for 129 positions added in 2019, along with 65 new positions approved for 2020.

Department expenses are allocated to the budgets for Transit Modes, Projects, and Others.

DEPARTMENT OVERVIEW SUMMARY
(in thousands)

Department	2019 Budget	2020 Budget	Budget $ Change	Budget % Change
Communications	$12,447	$13,626	$1,179	9.5%
Design, Engineering & Construction Management	55,100	65,867	10,767	19.5
Executive	26,941	31,942	5,001	18.6
Finance	26,375	30,638	4,262	16.2
Information Technology	32,784	36,283	3,499	10.7
Legal	4,845	5,442	598	12.3
Operations	325,995	334,400	8,405	2.6
Planning, Environment & Project Development	14,209	15,816	1,607	11.3
Safety & Quality Management	7,661	9,497	1,836	24.0
Operating Contingency	2,046	10,800	8,754	427.9
Total Department Budgets	**$508,402**	**$554,310**	**$45,909**	**9.0%**

Agency Staffing

Staffing growth in 2020 is driven primarily by increasing capital project activities. Sound Transit tracks and forecasts long-term staffing needs, balancing the addition of permanent positions with the use of consultants, to ensure capital and operating programs are adequately supported and affordable. Changes in departmental staffing levels from 2017 to the 2020 proposed budget are summarized below.

AGENCY STAFFING SUMMARY

			2019			2020	
Department	**2017**	**2018**	**Adopted**	**Changes**	**Current**	**New**	**Proposed**
Communications	41	69	71	1	72	0	72
Design, Engineering & Construction Management	297	309	327	0	327	7	334
Executive	161	194	156	6	162	9	171
Finance	77	90	102	(3)	99	5	104
Information Technology	94	115	121	6	127	15	142
Legal	21	23	23	0	23	2	25
Operations	162	183	225	1	226	21	247
Planning, Environment & Project Development	74	85	95	0	95	6	101
Safety & Quality Management	0	0	66	0	66	0	66
Total Positions	**927**	**1,068**	**1,186**	**11**	**1,197**	**65**	**1,262**

Note: Community Outreach division was transferred from DECM to COM in 2018. Safety and Quality Management was transferred from EXEC to become its own department in 2019.

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Transit Modes Summary

The 2020 budget for modal operations totals $370.0 million, which is $15.7 million or 4.4 percent higher than the 2019 budget. In 2020, Sound Transit expects to exceed 51 million boardings by providing approximately 985 thousand revenue vehicle hours across our four modes of service.

Transit mode costs include operations and vehicle maintenance provided primarily through agreements with our transit agency partners. Sound Transit employees perform operations and maintenance for Tacoma Link only. Our light rail, commuter rail, and express bus services are supported by 34 rail stations, six ST-owned transit centers, and six ST-owned park-and-ride lots. Sound Transit also operates through numerous facilities owned by other agencies.

The transit mode budgets shown in this section represent all operating budget activities associated with the mode, including agency administrative costs. Modal budgets comprises costs managed primarily by the Operations department, plus costs managed by other supporting departments.

2020 TRANSIT MODES BUDGET
(in thousands)

		2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Salaries & Benefits							
Salaries		$6,953	$7,175	$8,257	$8,953	$1,778	24.8
Benefits		4,496	4,931	5,672	6,147	1,216	24.7
	Subtotal	**11,449**	**12,106**	**13,929**	**15,100**	**2,994**	**24.7**
Services							
Marketing Agency		30	85	95	85	0	.0
Professional & Technical		1,408	6,217	6,184	4,758	(1,459)	(23.5)
Temporary Services		(1)	0	0	0	0	.0
Contract Maintenance		30,319	31,718	30,404	32,832	1,114	3.5
Security & Safety		23,933	34,012	30,427	33,058	(954)	(2.8)
Other Services		5,351	5,465	5,220	5,936	471	8.6
	Subtotal	**61,040**	**77,498**	**72,329**	**76,670**	**(828)**	**(1.1)**
Materials & Supplies		**8,820**	**11,186**	**10,572**	**11,087**	**(99)**	**(.9)**
Utilities		**5,496**	**5,714**	**5,354**	**5,931**	**217**	**3.8**
Insurance		**7,176**	**6,903**	**5,976**	**9,454**	**2,552**	**37.0**
Taxes		**3,182**	**2,974**	**2,667**	**3,079**	**105**	**3.5**
Purchased Transportation Services							
Paratransit		2,195	2,187	2,350	2,591	404	18.5
Purchased Transportation		174,069	193,999	191,423	200,834	6,835	3.5
	Subtotal	**176,264**	**196,186**	**193,773**	**203,425**	**7,239**	**3.7**
Miscellaneous							
Dues & Subscriptions		3	4	4	2	(2)	(58.1)
Travel & Meetings		77	124	103	46	(77)	(62.7)
Advertising & Promotion Media		417	400	358	400	0	.0
Training		34	60	48	64	5	8.1
Other Miscellaneous		42	73	66	78	5	6.8
	Subtotal	**573**	**661**	**579**	**591**	**(70)**	**(10.6)**
Leases & Rentals							
Transit Way		8,056	7,759	7,390	1,079	(6,680)	(86.1)
General Administrative Facilities		198	200	511	790	591	295.5
	Subtotal	**8,253**	**7,959**	**7,901**	**1,869**	**(6,090)**	**(76.5)**
Expense Transfers							
Capital Maintenance and Other Projects		2,659	3,899	3,899	9,377	5,478	140.5
Operations Department		7,232	8,976	8,404	10,621	1,645	18.3
Transfer to CIP		0	(909)	(717)	(1,731)	(822)	90.4
Administrative Departments		17,571	21,211	19,882	24,564	3,353	15.8
	Subtotal	**27,462**	**33,176**	**31,468**	**42,831**	**9,654**	**29.1**
Transit Modes Total		**$309,715**	**$354,362**	**$344,549**	**$370,037**	**$15,675**	**4.4%**

Summary by Mode

Link Light Rail

The Link Light Rail operates on over 20 miles of alignment between the University of Washington Station in the City of Seattle and Angle Lake Station in the City of SeaTac, serving 16 passenger stations, including four stations in the Downtown Seattle Transit Tunnel (DSTT). Sound Transit will take over the ownership of DSTT from King County Metro (KCM) effective January 1, 2020. Link is operated and maintained via a contract with KCM.

2020 LINK BUDGET
(in thousands)

		2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Salaries & Benefits							
Salaries		$3,108	$3,223	$3,548	$3,957	$734	22.8
Benefits		2,009	2,250	2,477	2,717	467	20.7
	Subtotal	**5,116**	**5,473**	**6,025**	**6,674**	**1,201**	**21.9**
Services							
Marketing Agency		12	34	31	38	4	12.5
Professional & Technical		309	4,262	3,863	2,841	(1,421)	(33.3)
Temporary Services		(1)	0	0	0	0	.0
Contract Maintenance		9,979	12,768	11,766	13,974	1,206	9.4
Security & Safety		18,059	26,185	23,454	25,572	(614)	(2.3)
Other Services		2,000	2,234	2,025	2,527	293	13.1
	Subtotal	**30,358**	**45,483**	**41,140**	**44,952**	**(531)**	**(1.2)**
Materials & Supplies		**3,594**	**4,563**	**4,563**	**4,381**	**(182)**	**(4.0)**
Utilities		**3,787**	**3,915**	**3,726**	**4,053**	**138**	**3.5**
Insurance		**5,014**	**4,295**	**3,795**	**6,100**	**1,805**	**42.0**
Taxes		**995**	**1,129**	**1,024**	**1,122**	**(8)**	**(.7)**
Purchased Transportation Services							
Paratransit		2,195	2,187	2,350	2,591	404	18.5
Purchased Transportation		44,728	50,969	50,969	54,760	3,791	7.4
	Subtotal	**46,923**	**53,156**	**53,319**	**57,352**	**4,196**	**7.9**
Miscellaneous							
Dues & Subscriptions		2	3	3	1	(2)	(67.2)
Travel & Meetings		27	55	50	35	(20)	(36.8)
Advertising & Promotion Media		161	160	145	180	20	12.5
Training		21	21	19	20	(1)	(5.5)
Other Miscellaneous		6	0	0	0	0	.0
	Subtotal	**217**	**240**	**217**	**236**	**(4)**	**(1.5)**
Leases & Rentals							
Transit Way		5,604	6,900	6,236	507	(6,393)	(92.7)
General Administrative Facilities		17	14	14	17	3	21.2
	Subtotal	**5,622**	**6,914**	**6,250**	**524**	**(6,390)**	**(92.4)**
Expense Transfers							
Capital Maintenance and other Projects		2,597	2,479	2,479	2,538	60	2.4
Operations Department		3,680	4,912	4,619	5,771	859	17.5
Administrative Departments		9,039	11,861	11,154	13,977	2,116	17.8
	Subtotal	**15,316**	**19,252**	**18,252**	**22,286**	**3,034**	**15.8**
Mode Total		**$116,942**	**$144,420**	**$138,311**	**$147,679**	**$3,259**	**2.3%**

Sounder Commuter Rail

Sounder commuter rail spans three counties and serves commuters making their way between Lakewood on the south end and Everett on the north end of Central Puget Sound. Sounder service operates via a contract with BNSF Railway Company, owner of the railway between Tacoma and Everett. Sound Transit owns the railway from Lakewood to Tacoma. Amtrak provides maintenance for the Sounder fleet of locomotives and passenger cars.

2020 SOUNDER BUDGET
(in thousands)

		2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Salaries & Benefits							
Salaries		$1,393	$1,361	$1,674	$1,560	$198	14.6
Benefits		897	946	1,163	1,071	125	13.2
	Subtotal	**2,290**	**2,308**	**2,837**	**2,630**	**323**	**14.0**
Services							
Marketing Agency		9	26	26	21	(4)	(16.7)
Professional & Technical		1,022	754	774	825	71	9.4
Contract Maintenance		14,880	15,895	16,316	16,281	386	2.4
Security & Safety		3,137	4,269	3,825	4,078	(191)	(4.5)
Other Services		2,011	2,045	2,099	2,132	87	4.2
	Subtotal	**21,059**	**22,989**	**23,041**	**23,338**	**349**	**1.5**
Materials & Supplies		**4,961**	**6,331**	**5,805**	**6,294**	**(37)**	**(.6)**
Utilities		**1,338**	**1,357**	**1,231**	**1,415**	**58**	**4.3**
Insurance		**2,242**	**2,274**	**1,874**	**2,797**	**523**	**23.0**
Taxes		**1,432**	**1,107**	**1,004**	**1,235**	**128**	**11.6**
Purchased Transportation Services							
Purchased Transportation		12,962	13,028	13,373	14,107	1,079	8.3
	Subtotal	**12,962**	**13,028**	**13,373**	**14,107**	**1,079**	**8.3**
Miscellaneous							
Dues & Subscriptions		1	1	1	1	(0)	(31.8)
Travel & Meetings		12	17	15	10	(7)	(39.5)
Advertising & Promotion Media		121	120	109	100	(20)	(16.7)
Training		3	3	3	3	0	.5
Other Miscellaneous		36	73	66	78	5	6.8
	Subtotal	**173**	**214**	**194**	**192**	**(22)**	**(10.2)**
Leases & Rentals							
Transit Way		377	380	576	412	32	8.3
General Administrative Facilities		154	155	474	750	595	382.7
	Subtotal	**531**	**536**	**1,050**	**1,162**	**626**	**116.9**
Expense Transfers							
Capital Maintenance and other Projects		41	1,420	1,420	6,467	5,047	355.4
Operations Department		1,520	1,751	1,610	2,175	424	24.2
Administrative Departments		2,703	3,237	2,977	3,853	617	19.1
	Subtotal	**4,264**	**6,407**	**6,007**	**12,495**	**6,087**	**95.0**
Mode Total		**$51,250**	**$56,552**	**$56,416**	**$65,666**	**$9,114**	**16.1%**

ST Express Bus

ST Express offers fast, frequent, two-way service on 27 routes, connecting Snohomish, King, and Pierce Counties. Sound Transit provides this bus service via non-competitively procured service agreements with transit partners, including King County Metro, Pierce Transit, and Community Transit in Snohomish County. ST Express provides services to over 50 transit centers and park-and-ride lots.

2020 ST EXPRESS BUDGET
(in thousands)

		2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Salaries & Benefits							
Salaries		$741	$733	$853	$805	$72	9.9
Benefits		481	506	589	553	47	9.3
	Subtotal	**1,222**	**1,238**	**1,442**	**1,358**	**120**	**9.7**
Services							
Marketing Agency		9	26	24	26	0	.0
Professional & Technical		70	1,186	1,097	1,054	(132)	(11.2)
Contract Maintenance		4,748	2,510	2,321	1,844	(665)	(26.5)
Security & Safety		2,272	2,949	2,602	2,849	(100)	(3.4)
Other Services		1,335	1,176	1,088	1,268	91	7.7
	Subtotal	**8,435**	**7,847**	**7,133**	**7,041**	**(807)**	**(10.3)**
Materials & Supplies		**68**	**71**	**61**	**112**	**41**	**58.5**
Utilities		**272**	**333**	**289**	**357**	**24**	**7.2**
Insurance		**(288)**	**152**	**132**	**302**	**150**	**99.0**
Taxes		**755**	**738**	**639**	**720**	**(18)**	**(2.4)**
Purchased Transportation Services							
Purchased Transportation		116,379	129,997	127,076	131,962	1,964	1.5
	Subtotal	**116,379**	**129,997**	**127,076**	**131,962**	**1,964**	**1.5**
Miscellaneous							
Dues & Subscriptions		0	0	0	0	0	.0
Travel & Meetings		9	15	13	1	(14)	(94.5)
Advertising & Promotion Media		135	120	104	120	0	.0
Training		0	10	9	6	(4)	(41.1)
	Subtotal	**145**	**145**	**126**	**127**	**(18)**	**(12.6)**
Leases & Rentals							
Transit Way		2,075	479	578	160	(319)	(66.6)
General Administrative Facilities		2	0	0	0	(0)	(15.0)
	Subtotal	**2,076**	**480**	**578**	**161**	**(319)**	**(66.5)**
Expense Transfers							
Capital Maintenance and other Projects		22	0	0	372	372	100.0
Operations Department		1,825	2,068	1,930	2,295	227	11.0
Administrative Departments		5,153	5,400	5,038	6,042	643	11.9
	Subtotal	**7,000**	**7,468**	**6,968**	**8,710**	**1,242**	**16.6**
Mode Total		**$136,065**	**$148,469**	**$144,442**	**$150,849**	**$2,380**	**1.6%**

Tacoma Link Light Rail

Tacoma Link is a 1.6-mile light rail passenger line that connects the heart of downtown Tacoma with the regional transportation hub at Tacoma Dome Station. It is operated and maintained by Sound Transit. There are six unique stations complete with artwork that reflects the history and community of Tacoma. Trains run every 12 minutes during the day on weekdays and Saturdays, and every 24 minutes at all other times.

2020 TACOMA LINK BUDGET
(in thousands)

		2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Salaries & Benefits							
Salaries		$1,711	$1,858	$2,182	$2,631	$773	41.6
Benefits		1,110	1,229	1,444	1,806	577	47.0
	Subtotal	**2,821**	**3,087**	**3,626**	**4,437**	**1,351**	**43.8**
Services							
Professional & Technical		8	15	14	38	23	156.3
Contract Maintenance		712	546	449	732	186	34.1
Security & Safety		464	609	546	560	(49)	(8.1)
Other Services		4	9	6	10	0	3.1
	Subtotal	**1,188**	**1,179**	**1,015**	**1,340**	**160**	**13.6**
Materials & Supplies		**198**	**220**	**143**	**299**	**79**	**35.7**
Utilities		**99**	**108**	**108**	**106**	**(2)**	**(2.2)**
Insurance		**208**	**181**	**176**	**255**	**74**	**40.8**
Taxes		**0**	**0**	**0**	**3**	**3**	**735.3**
Purchased Transportation Services							
Purchased Transportation		0	5	5	5	0	.0
	Subtotal	**0**	**5**	**5**	**5**	**0**	**.0**
Miscellaneous							
Dues & Subscriptions		0	0	0	0	0	.0
Travel & Meetings		29	36	25	0	(36)	(99.6)
Training		9	25	17	35	10	39.4
	Subtotal	**38**	**62**	**42**	**36**	**(26)**	**(42.4)**
Leases & Rentals							
General Administrative Facilities		24	30	23	23	(7)	(23.3)
	Subtotal	**24**	**30**	**23**	**23**	**(7)**	**(23.3)**
Expense Transfers							
Operations Department		206	245	245	380	134	54.8
Transfer to CIP		0	(909)	(717)	(1,731)	(822)	90.4
Administrative Departments		676	713	713	691	(22)	(3.1)
	Subtotal	**882**	**49**	**241**	**(660)**	**(709)**	**(1,455.9)**
Modes Total		**$5,459**	**$4,922**	**$5,379**	**$5,844**	**$922**	**18.7%**

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Project Budgets

Project Budget Summary

Total project spending is budgeted at $2.5 billion for 2020. Approximately $2.3 billion or 90.8 percent is budgeted to continue with planning, design, and build-out of Sound Transit's capital program. An additional $114.5 million is budgeted to enhance, replace or maintain current operational assets and capabilities. Administrative projects, which include information technology hardware and applications, administrative costs allocated to construction in progress, and general and administrative expense, are budgeted at $127.3 million.

The Transit improvement Plan (TIP) that appears later in this document, includes history and forecasts for all Board authorized project allocations for active projects. This section provides projects organized first by category: System Expansion, System Enhancement, State of Good Repair, Administrative, and Other, and then by mode: Link, Sounder, Regional Express, Stride and Other (non-mode specific).

System Expansion

System Expansion projects expand the regional transit system, and include planning, design, and construction of light rail, commuter rail, express bus, and bus rapid transit infrastructure.

System Expansion – Link 2020 Budget Highlights

Link light rail projects account for $2.1 billion and include plans to:

- Establish and commence preliminary engineering and environmental review for the Everett Link Extension project, which represents the combination of two ST3 voter-approved projects: Lynnwood to Everett Link Extension and Operations and Maintenance Facility North.
- Continue preliminary engineering and environmental review on Tacoma Dome Link Extension, which represents the combination of two ST3 voter-approved projects: Federal Way to Tacoma Dome Link Extension and Operations and Maintenance Facility South.
- Continue preliminary engineering and environmental review on the West Seattle and Ballard Link extensions, which represent the combination of three ST3 voter-approved projects: Ballard Link Extension, the Downtown Seattle Light Rail Tunnel and West Seattle Link Extension.
- Begin planning and early right-of-way valuation for North Corridor Maintenance of Way facility.
- Mobilize construction on Downtown Redmond Link and Federal Way Link extensions.
- Continue systems design, procurement of systems long lead time procurements, advanced utility relocation, and ramp up of civil construction for Lynnwood Link Extension.
- Reach substantial completion on seven segments and continue systems implementation for East Link Extension.
- Reach substantial completion on Northgate Link terminus station and elevated guideway and post-substantial completion for underground stations at Roosevelt and U-District, along with ongoing systems installation.
- Continue construction on the main line and Operations and Maintenance Facility and production oversight of five light rail vehicles for the Hilltop Tacoma Link Extension.
- Continue fleet inspection, delivery and commissioning process for 30 Link light rail vehicles.
- Continue closeout activities for University Link and South 200th Link extensions.

2020 SYSTEM EXPANSION – LINK BUDGET
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Downtown Redmond Link Extension	$15,004	$158,410	$126,073	$149,607	($8,803)	(5.6)%
DSTT Single Tracking	0	2,500	1,409	0	(2,500)	(100.0)
East Link Extension	623,536	743,944	613,938	605,984	(137,960)	(18.5)
Enhancements to Tacoma Link Extension	1,117	910	271	0	(910)	(100.0)
Everett Link Extension	0	0	145	14,560	14,560	0.0
Federal Way Link Extension	29,834	175,087	256,243	313,935	138,848	79.3
First Hill Streetcar	4	8	6	0	(8)	(100.0)
Hilltop Tacoma Link Extension	20,393	61,344	61,278	61,730	386	0.6
Light Rail Vehicle Fleet Expansion	13,131	86,068	86,068	137,235	51,167	59.4
Link Operations & Maintenance Facility: East	53,789	108,417	99,307	68,050	(40,367)	(37.2)
Lynnwood Link Extension	99,114	443,593	291,366	504,702	61,109	13.8
NE 130th Street Infill Station	87	5,905	3,211	577	(5,328)	(90.2)
North Corridor MOW	38	0	23	439	439	0.0
Northgate Link Extension	286,985	244,800	243,835	126,148	(118,652)	(48.5)
South 200th Link Extension	957	221	418	146	(75)	(33.9)
Tacoma Dome Link Extension	7,010	13,280	15,902	25,902	12,622	95.0
University Link Extension	4,251	2,921	9,653	1,750	(1,171)	(40.1)
West Seattle and Ballard Link Extensions	21,352	31,300	26,974	52,301	21,001	67.1
Total System Expansion - Link	**$1,176,602**	**$2,078,708**	**$1,836,121**	**$2,063,066**	**($15,642)**	**(0.8)%**

System Expansion - Sounder 2020 Budget Highlights

Sounder commuter rail projects are budgeted at $56.9 million and include plans to:

- Start preliminary engineering, environmental review and alternatives analysis for Lakewood Station Improvements.
- Begin request-for-proposal process for Kent and Auburn Station access improvement design-build contracts.
- Complete the alternatives analysis for Edmonds and Mukilteo stations and parking access improvements.
- Prepare for easement renewals and additions, as well as considerations stemming from Sounder South Capacity Expansion project.
- Commence utility relocations and right-of-way acquisitions for Sounder Maintenance Base.
- Continue closeout activities on seven Sounder projects.

2020 SYSTEM EXPANSION – SOUNDER BUDGET
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Auburn Station Parking and Access Improvements	$1,516	$5,147	$1,848	$5,335	$188	3.7 %
D St-M St Track & Signal	7	50	21	30	(20)	(40.0)
Edmonds and Mukilteo Stations Parking & Access Improvements	114	848	573	1,161	313	36.9
Kent Station Parking and Access Improvements	1,597	3,911	1,566	7,304	3,393	86.8
Lakewood Station Improvements	0	0	13	811	811	0.0
Mukilteo Station, S Platform	55	975	595	379	(596)	(61.1)
Point Defiance Bypass	122	100	15	50	(50)	(50.0)
Puyallup Station Parking and Access Improvements	3,425	9,188	3,674	24,375	15,187	165.3
Sounder Fleet Expansion	1,792	7,513	3,133	5,236	(2,277)	(30.3)
Sounder Maintenance Base	2,007	7,087	4,500	2,982	(4,105)	(57.9)
Sounder South Expanded Service	3,779	2,314	2,187	75	(2,239)	(96.8)
Sounder Yard Expansion	182	100	73	55	(45)	(45.0)
South Sounder Capacity Expansion	238	2,228	1,824	1,159	(1,069)	(48.0)
Sumner Station Parking and Access Improvements	1,417	5,422	1,892	7,686	2,264	41.8
Tacoma Trestle Track & Signal	7,256	1,080	4,084	258	(822)	(76.1)
Tukwila Station	23	1,280	614	50	(1,230)	(96.1)
Total System Expansion - Sounder	**$23,529**	**$47,243**	**$26,611**	**$56,946**	**$9,703**	**20.5 %**

System Expansion - Regional Express 2020 Budget Highlights

Regional Express bus projects are budgeted at $43.3 million and include plans to:

- Take delivery of six additional buses to expand ST Express fleet.
- Begin fixed contributions to development of Rapid Ride C&D in Seattle and Pacific Ave SR7 Bus Corridor Improvements in Tacoma.
- Identify potential locations to implement Bus on Shoulder program.
- Support closeout process for I-90 Two-way Transit and HOV Operations Stage 3 project.

2020 SYSTEM EXPANSION – REGIONAL EXPRESS BUDGET
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Bus Base South	$5	$587	$46	$600	$13	2.2 %
Bus on Shoulder	431	1,187	361	1,495	308	25.9
I-90 Two-Way Transit & HOV Operations, Stage 3	7,853	6,340	7,184	1,570	(4,770)	(75.2)
North Sammamish Park-and-Ride	43	455	285	765	310	68.1
Pacific Ave SR 7 Bus Rapid Transit	4	2,535	2,035	10,590	8,055	317.8
RapidRide C and D	11	750	650	5,495	4,745	632.7
ST Express Fleet Expansion	15,384	0	0	22,817	22,817	0.0
CLOSED						
Bothell Transit Related Improvements	1	0	0	0	0	0.0
Total System Expansion - Regional Express	**$23,733**	**$11,854**	**$10,561**	**$43,332**	**$31,478**	**265.5 %**

System Expansion - Stride 2020 Budget Highlights

Stride bus rapid transit projects are budgeted at $92.6 million and include:

- Continue preliminary engineering for Brickyard In-line Freeway Station and 85th Street Interchange and construction at NE 44th Street Interchange on I-405.
- Continue construction of the Business Access and Transit lanes in Bothell.
- Begin preliminary engineering and right-of-way acquisition for Bus Base North.

2020 SYSTEM EXPANSION – STRIDE BUDGET
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
I-405 Bus Rapid Transit	$6,133	$65,232	$57,285	$63,298	($1,934)	(3.0)%
SR 522/NE 145th St BRT	3,213	16,875	15,140	27,178	10,303	61.1
Bus Base North	277	37,543	24,460	2,090	(35,453)	(94.4)
Total System Expansion - Bus Rapid Transit	**$9,624**	**$119,650**	**$96,885**	**$92,566**	**($27,084)**	**(22.6)%**

System Expansion - Other 2020 Budget Highlights

System Expansion – Other projects are budgeted at $29.0 million and include plans to:

- Support increased capacity of information system network by developing a scope and cost estimate.
- Implement fare changes and expand ORCA LIFT program.
- Support station area planning for transit-oriented development (TOD).
- Fabricate and install art for Federal Way and Downtown Redmond Link extension projects.
- Begin funding awards to third parties to invest in non-motorized access improvements around existing passenger facilities.

2020 SYSTEM EXPANSION – OTHER BUDGET
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
Efficiency & Sustainability	$0	$1,502	$7	$896	($606)	(40.3)%
Environmental Remediation	0	0	0	500	500	0.0
Fare Administration	942	500	278	630	130	26.0
Fare Collection	175	776	445	17	(759)	(97.8)
Innovation and Technology Program	910	2,330	1,938	2,425	95	4.1
Next Generation ORCA	597	3,793	2,962	2,968	(825)	(21.8)
Research & Technology	92	1,226	559	3,100	1,874	152.9
Research and Business Development Program	56	205	1	534	329	160.5
ST3 Planning	1,036	4,550	2,440	3,087	(1,463)	(32.2)
STart	2,889	3,849	5,537	6,303	2,454	63.8
STart Operations & Maintenance	154	227	69	321	94	41.5
Transit Oriented Development Planning Program	87	425	64	1,065	640	150.6
Transit Oriented Development Property Disposition	1,528	2,432	811	1,221	(1,211)	(49.8)
Transit System Access Program	503	7,000	1,243	5,900	(1,100)	(15.7)
Total System Expansion - Other	**$8,968**	**$28,815**	**$16,354**	**$28,967**	**$152**	**0.5 %**

Enhancement

Enhancement projects improve operating efficiency and effectiveness, improve rider experience, increase system functionality, or reduce operating costs.

Enhancement 2020 Budget Highlights

Enhancement projects are budgeted at $38.4 million and include plans to:

- Design escalator improvements for the University of Washington Station to achieve higher reliability and safety.
- Establish Parking Management program to support paid parking at ST facilities.
- Install on-demand bike lockers at selected locations.
- Begin design and installation of a second elevator at Airport Station.
- Continue renovations at OMF Central to support relocation of Link Control Center and increased staff.
- Contribute funding to signal and street improvements to mitigate the impacts of buses moving from the downtown Seattle Transit Tunnel (DSTT) to surface streets.
- Continue preliminary engineering for Passenger Information Management System (PIMS) project.

2020 ENHANCEMENT BUDGET
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
LINK						
Escalator Modernization Program	$0	$4,963	$1,862	$3,427	($1,536)	(30.9)%
Light Rail Vehicle Wireless Communication Upgrade	0	158	146	0	(158)	(100.0)
LRV Between Car Barriers	0	108	39	0	(108)	(100.0)
LRV Wash Bay Modifications	31	268	268	0	(268)	(100.0)
Noise Abatement	5	442	400	900	458	103.6
Non-revenue Support Vehicles	192	1,620	(34)	3,014	1,394	86.0
OMF Energy Efficiency	98	34	39	0	(34)	(100.0)
Operations & Maintenance Facility Light Rail Vehicle Lift	754	2,374	2,374	1,134	(1,240)	(52.2)
Operations Maintenance Facility (OMF) - Link Control Center (LCC) Upgrades	0	400	41	566	166	41.5
Operations Maintenance Facility (OMF) - Renovations	262	2,583	2,583	5,654	3,071	118.9
Operations Maintenance Facility (OMF) Expanded Parking	75	38	356	105	67	173.6
SeaTac Airport Second Elevator	0	0	0	745	745	0.0
SeaTac Airport Wrong Door Fall Protection	0	0	0	561	561	0.0
Signage Improvements	96	162	153	280	118	73.2
Tacoma Link Radio Upgrade	10	739	739	0	(739)	(100.0)
Tacoma Link Fare Collection	0	0	0	0	0	0.0

2020 ENHANCEMENT BUDGET (CONTINUED)
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
SOUNDER						
Customer Emergency Stations	243	0	0	0	0	0.0
Kent Station Parking Lot Paving	3	0	0	0	0	0.0
Kent Station Platform Lighting	1	5	5	0	(5)	(100.0)
Locomotive Inboard Cameras	0	0	0	300	300	0.0
Positive Train Control	2,739	278	451	220	(58)	(20.9)
Puyallup Station LED Lighting	1	5	5	0	(5)	(100.0)
Sounder Passenger Emergency Intercom	0	0	0	1,500	1,500	0.0
Sumner Station LED Lighting	1	4	4	0	(4)	(100.0)
REGIONAL EXPRESS						
Bus Maintenance Facility	133	0	0	0	0	0.0
Community Transit - On-Board Communication Upgrade	0	1,046	1,047	1,033	(13)	(1.2)
Pierce Transit - Global Positioning System Repeater	0	0	0	0	0	0.0
OTHER						
Bike Parking Program	2	1,400	1,400	2,284	884	63.1
Design Criteria Manual Update	0	0	0	200	200	0.0
Downtown Seattle & Regional Mobility Improvements	2,719	5,863	5,863	3,327	(2,536)	(43.3)
Everett Station Security Improvements	0	289	289	0	(289)	(100.0)
LED Lighting Program	0	387	0	245	(142)	(36.7)
Parking Management Program	0	0	0	1,926	1,926	0.0
Passenger Information Management System	412	6,036	3,273	8,958	2,922	48.4
Security Operations Center - Video Monitoring Improvements	7	234	234	0	(234)	(100.0)
Security Radio System	155	742	105	1,008	266	35.8
SODO/MLK Hazard Mitigation	106	3,030	943	610	(2,420)	(79.9)
Union Station Garden Level Remodel	92	0	6	0	0	0.0
Video Management System Upgrade	0	549	900	390	(159)	(29.0)

2020 ENHANCEMENT BUDGET (CONTINUED)
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
CLOSED						
Link Operating Segment Systems Enhancements and Upgrades	10	1,385	43	0	(1,385)	(100.0)
Opensidewalks Data Development	0	0	0	0	0	0.0
King St Station Platform Improvements	38	0	1	0	0	0.0
Bellevue TC Security System	72	0	0	0	0	0.0
LRV Wheel Flat Software	0	0	0	0	0	0.0
Central Link HVAC - Instrument House and UPS Room	0	0	0	0	0	0.0
Central Link Card Readers	0	0	0	0	0	0.0
Central Link Overhead Catenary System Tie Switch	0	0	0	0	0	0.0
Bike Locker Program	0	0	0	0	0	0.0
Lakewood MOW Renovation	0	75	0	0	(75)	(100.0)
Total Enhancement	**$8,258**	**$35,219**	**$23,538**	**$38,387**	**$3,168**	**9.0 %**

State of Good Repair

State of Good Repair projects extend the life of existing transit system assets, replace those at the end of their useful life, and invest in maintaining assets in a state of good repair.

State of Good Repair 2020 Budget Highlights

State of Good Repair projects are budgeted at $76.1 million and include plans to:

- Begin repairs to the Downtown Seattle Transit Tunnel (DSTT) stations and vertical conveyances to bring these assets into alignment with Sound Transit standards.
- Perform on-train communications technology upgrades and install automatic passenger counters on all in-service light rail vehicles to ensure compatibility with new light rail vehicles.
- Maintain all equipment and facilities in a state of good repair.
- Perform lifecycle maintenance for administrative and operational technology infrastructures.
- Accept and commission 26 ST Express replacement buses to maintain bus fleet reliability.

2020 STATE OF GOOD REPAIR BUDGET
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
LINK						
Access Control Card Upgrade	$40	$1,370	$1,182	$768	($602)	(43.9)%
Convention Place Development Systems Retrofit	130	350	203	2,214	1,864	532.6
DSTT Capital Improvements	0	8,500	1,630	24,160	15,660	184.2
Kinkisharyo LRV Systems Upgrade	0	0	0	3,300	3,300	0.0
Light Rail Vehicle Overhaul	122	1,500	200	950	(550)	(36.7)
Link Bridge Repairs	0	60	10	200	140	233.3
Link CCTV System Upgrade	41	1,980	2,149	278	(1,702)	(86.0)
Link Light Rail Vehicle Overhaul	2,648	2,479	2,479	2,000	(479)	(19.3)
Link Radio Upgrade	0	986	0	0	(986)	(100.0)
Link Station Tile Replacement	0	399	25	846	447	111.9
OT Virtual System Hardware Upgrade	0	0	0	600	600	0.0
Small Works Program	395	1,671	972	1,798	127	7.6
Tacoma Link HVAC and Building Systems Upgrade	0	400	267	370	(30)	(7.5)
Tacoma Link Light Rail Vehicle Overhaul	2	386	193	386	0	0.1
Wheel Truing Machine	0	960	960	1,395	435	45.3
SOUNDER						
Sounder Vehicle Overhaul Program	548	2,570	2,570	6,692	4,122	164.4
REGIONAL EXPRESS						
ST Express Fleet Replacement	5,821	0	0	26,099	26,099	0.0

2020 STATE OF GOOD REPAIR BUDGET (CONTINUED)
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
OTHER						
Information Technology (IT) Infrastructure	1,213	1,864	912	1,730	(134)	(7.2)
IT Transit Systems	0	135	11	78	(57)	(42.3)
Station Midlife Refurbishment Program	103	1,350	1,350	2,239	889	65.8
Tacoma Dome Station	410	0	1,801	0	0	0.0
CLOSED						
Othello Traction Power Sub-station Parking Lot	300	2	0	0	(2)	(100.0)
Total State of Good Repair	**$11,774**	**$26,961**	**$16,914**	**$76,103**	**$49,142**	**182.3 %**

Administrative

Administrative projects support the general administration of the agency. The majority of these costs are capitalized with the assets of the projects or expensed as transit operating costs. Remaining costs are treated as general and administrative expenses and fare and regional planning.

Administrative 2020 Budget Highlights

Administrative projects are budgeted at $127.3 million and include plans to:

- Fund department costs allocated to projects as administrative costs as well as department costs that are unallocated.
- Continue HVAC replacement for Union Station.
- Accommodate agency growth with office space development and furnishing and procurement of 23 fleet vehicles.
- Continue migration to SharePoint 365 and development and implementation of Operating Performance Management system.

2020 ADMINISTRATIVE BUDGET
(in thousands)

Project	2018 Actual	2019 Budget	2019 Forecast	2020 Budget	Budget $ Change	Budget % Change
OTHER						
Administrative Capital	$2,749	$3,104	$2,492	$6,452	$3,348	107.9 %
Agency Administration Operating	77,387	80,681	100,151	112,520	31,839	39.5
Environmental Mitigation, Monitoring & Maintenance	75	125	22	100	(25)	(20.0)
Information Technology Program	3,980	4,548	3,575	8,243	3,695	81.2
CLOSED						
Surplus Property Disposition	10	115	59	0	(115)	(100.0)
Total Administrative	**$84,200**	**$88,573**	**$106,299**	**$127,315**	**$38,742**	**43.7 %**

Other Budgets Summary

Other budgets include debt service, contributions to other governments, and tax collection and fees. In 2020 debt service is budgeted at $144.4 million and includes interest, principal repayments, and financing expenses. Contributions to other governments is budgeted at $5.0 million. Tax collection and fees are budgeted at $16.6 million.

Debt Service

As of December 31, 2019 Sound Transit has $2.3 billion of outstanding long-term bonds and four Transportation Infrastructure Finance and Innovation Act (TIFIA) loan agreements for Operations and Maintenance Facility East, and Northgate Link, East Link, and Lynnwood Link extensions.

Sound Transit has executed TIFIA loan drawdowns of: $81.6 million for the Northgate Link Extension, $50 million for East Link Extension, and $25 million for Operation and Maintenance Facility East, totaling $156.6 million.

2020 debt service is budgeted at $144.4 million including:

- $42.9 million of principal repayment.
- $100.9 million of interest expense including loan amortization.
- $597 thousand for financing expenses.

Contributions to Other Governments

Sound Transit will make a $5.0 million contribution for operating and maintenance expenses of First Hill Street car based on an agreement with the City of Seattle.

In addition, the following contributions are budgeted in projects. In 2020 $86.2 million is expected to be paid to other governments for planning and construction of transportation assets. The cost to Sound Transit is accounted for in the following projects:

- I-405 BRT: WSDOT for the NE 145th Interchange - $41.4 million.
- SR 522: City of Bothell for Business Access and Transit lanes - $27.2 million.
- Pacific Avenue SR7 Bus Corridor Improvements: Pierce Transit for design and construction - $10.6 million.
- Rapid Ride C&D and Madison BRT: King County Metro for street improvements to enable rapid ride routes - $5.5 million.
- Bus on Shoulder: WSDOT to identify and evaluate potential opportunities - $1.5 million.

Tax Collection and Fees

Sound Transit pays the Washington State Department of Revenue (DOR) fees for the collection and administration of sales and use taxes and rental car taxes and the Washington State Department of Licensing (DOL) fees for the collection and administration of motor vehicle excise taxes. The DOR and DOL fees are budgeted at $5.2 million in 2020.

In 2019 Sound Transit began paying the sales and use tax offset fee, which was added to the ST3 enabling legislation and approved in the ST3 plan. The fee will be paid to the Washington DOR and is based on 3.25 percent of construction contract payments for new ST3 projects, up to a total amount of $518.0 million. The 2020 budget anticipates contributions from four projects: Federal Way Link Extension $6.4 million, I-405 Bus Rapid Transit $975 thousand, Downtown Redmond Link Extension $3.5 million, and SR 522 Bus Rapid Transit $480 thousand, totaling $11.4 million.

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Transit Improvement Plan

The 2020 Transit Improvement Plan (TIP) provides a six-year cost forecast for active projects, a six-year forecast for operating costs by mode as well as a list of contributions to reserves.

For all active projects cost information is presented by phase, including life-to-date costs, annual spending forecasts for the upcoming six years, summarized costs for years beyond this six-year period, and the total Board-authorized project allocation to date. The scope, budget-year activities, increase to the authorized project allocation, and project risk information is also provided for each project. Details for each project are available in Appendix D.

The Sound Transit Board adopts the TIP and the annual budget to authorize spending for the budget year as well as changes to authorized project allocations to date.

Project Budgeting

Project Prioritization Process

During the development of the annual budget, the agency follows an objective process to evaluate all proposed capital projects. After budgeting for voter-approved system projects, proposed new projects and increases to existing projects that are not part of the voter-approved capital program are considered. Projects are scored using objective criteria including: safety, sustainability, regulatory, financial, security, asset life, resource capacity to deliver projects and impact on ridership. The goal is to identify high-value, high-priority projects and pair them with available resources.

Authorized Project Allocations

The Sound Transit Board approves the initial phases of project budgets at the outset of a capital project. As projects reach key milestones, requests for increases in authorized project allocations to complete the next project phase are presented for Board approval.

Typical budget requests include funding for:

- Project development through preliminary engineering and environmental review.
- Final design and right-of-way acquisition.
- Total expected project budget, or Baseline.

The initial project development budget includes alternatives analysis and selection of a preferred alternative, compliance with environmental requirements, development of operations and maintenance plans, and preliminary engineering for the preferred alternative.

A final design and right-of-way budget includes funding for all design work, including architectural, civil, structural, electrical, and HVAC systems through to construction procurement documentation, as well as purchase or lease of all property needed to build the project.

A baseline budget is established during final design when sufficient information is available to establish the cost of a project through construction. Project spending is benchmarked against the baseline through completion of the project. Projects are fully funded when the Board approves the baseline.

Cost Estimates

Sound Move, ST2, and ST3 are voter-approved segments of the capital project. Each voter-approved project has a cost estimate that originated from one of the three voter-approved plans. Appendix A lists ST2 and ST3 cost estimates and Appendix B provides budget for remaining Sound Move projects.

Cost estimates are maintained on a current-year, constant-dollar basis. In the 2020 TIP, full project cost estimates are presented in constant 2019 dollars. The constant dollar presentation allows for comparison of estimated costs across multiple projects. However, the Board approves budgets in year-of-expenditure dollars to take into account the fact that project spending occurs over several years and so must be adjusted for inflation.

Projects Summary

The majority of Sound Transit's projects support the planning, design, and construction of light rail, commuter rail, express bus, and bus rapid transit infrastructure as described in the voter-approved capital plans. The Transit Improvement Plan (TIP) uses project categories which align with common industry practice and provide transparency into the agency's investment in expanding service versus investment in existing assets. Projects are also reported by mode.

PROJECTS SUMMARY BY PROJECT TYPE
(in millions)

	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total TIP
System Expansion									
Link	$7,631	$2,063	$1,790	$1,580	$1,635	$929	$367	$673	$16,669
Sounder	718	57	50	10	4	-	1	65	905
Regional Express	228	43	49	47	21	9	-	17	415
Stride	112	93	67	44	20	3	-	-	339
Other	92	29	44	23	24	45	18	337	612
System Expansion Subtotal	8,781	2,285	2,000	1,704	1,704	987	386	1,092	18,939
Enhancement	99	38	49	24	26	15	3	17	272
State of Good Repair	207	76	65	35	33	7	3	35	462
Administrative	584	127	138	142	142	143	145	74	1,495
Total	**$9,672**	**$2,527**	**$2,253**	**$1,905**	**$1,905**	**$1,152**	**$537**	**$1,218**	**$21,167**

2020 Closed Projects

The following projects have been closed and excluded from the 2020 TIP. Projects were completed under budget or were cancelled.

CLOSED PROJECTS
(In thousands)

	Baseline Budget	Final Cost	Savings/ (Over)
Enhancement Projects			
Link Operating System Enhancement Upgrade	$1,400	$ 65	$1,335
Open-sidewalk Data Development	60	50	10
Bellevue TC Security System	150	72	78
LRV Wheel Flat Software	250	-	250
Central Link HVAC - Instrument House and UPS Room	1,232	823	408
Central Link Overhead Catenary System - Tie Switch	42	7	35
Bike Locker Program	1,243	1,241	2
King St Station Platform Improvement	300	43	257
C Link Card Readers	423	131	292
State of Good Repair Projects			
King Street Station Vertical Glazing	767	-	767
Othello TPSS Parking Lot	455	431	24

Transit Modes Summary

The 2020 TIP contains forecasted expenses to operate and maintain the regional transit system from 2020 through 2025. Operating expenses include the costs of third-party operators for light rail, commuter rail, express bus services, and bus rapid transit, that include Sound Transit's direct costs and administrative costs for providing those services.

As a part of the annual budget, the Sound Transit Board approves spending for each of these modal services for the following fiscal year.

There are no service levels changes planned for any of Sound Transit's modes in 2020. However, between 2021 and 2024 six new light rail extensions will open along with new bus rapid transit service in 2024.

Buses no longer operate in the Downtown Seattle Transit Tunnel and Link light rail operations are now responsiblef for all costs. In mid-2020 the Link Operations and Maintenance Facility East will open with all costs attributed to Link operations. Vehicle maintenance costs are expected to increase over this six-year time period due to aging of the fleet. In 2021 Northgate Link Extension will begin revenue service with a full year of operations in 2022 and East Link Extension will begin revenue service in 2023.

Sounder costs will increase in 2021 when the new Sounder Maintenance Base is scheduled to open.
ST Express costs are expected to rise as more buses are required to maintain current services levels due to traffic congestion. As new Link extensions become operational, express bus service is expected to be retracted.

The expansion of Tacoma Link to the Hilltop area of Tacoma is currently under construction with projected revenue service opening in 2022. Expansion of the Tacoma Link Operations and Maintenance Facility is expected to be complete in 2021. Hiring for startup activities began in 2018 and will continue as training and other startup activities continue in advance of opening the new extension. Staff, maintenance, insurance, and other costs will increase substantially once the expansion opens.

TRANSIT MODES SUMMARY
(in millions)

	2020	2021	2022	2023	2024	2025
Link Light Rail	$148	$174	$200	$235	$320	$370
Sounder Commuter Rail	66	71	75	71	71	73
ST Express Bus	151	171	177	182	173	150
Tacoma Link Light Rail	6	10	13	16	19	19
Stride Bus Rapid Transit	-	-	-	-	31	55
Total	**$370**	**$426**	**$464**	**$505**	**$583**	**$613**

Reserves Summary

Sound Transit maintains reserves in anticipation of future financial obligations. Amounts budgeted as reserves are not included in our spending authorization request. If reserved funds are to be used, the Board's approval is required in advance.

- Emergency/Loss

  While the agency maintains a comprehensive insurance program, the policies do contain retentions (deductibles), which the agency would have to cover in the event of an insurable loss. In such instances, Board authorization would be required to use this reserve to cover a deductible. Approval of the ST3 Plan increased the reserve from $38 million to $88 million.

  The reserve balance is projected to be $30.4 million at the end of 2019. A contribution of $5.5 million is budgeted for 2020.

- Operations & Maintenance

  Sound Transit's financial policies require the agency to maintain an operations and maintenance reserve equal to two months of department operating expenses, including costs allocated to transit modes and projects.

  The reserve balance is projected to be $86.7 million at the end of 2019. A contribution of $3.9 million is budgeted for 2020 to increase the reserve to $90.6 million.

- Capital Replacement

  The agency maintains a minimum $300 million reserve for unanticipated expenditures necessary to keep the system in good working condition.

  The reserve balance is projected to be as $333.1 million at the end of 2019. No contribution will be needed in 2020.

- Regional Affordable Housing Revolving Loan Fund

  The ST3 Plan requires that Sound Transit establish a revolving loan fund to support development of affordable housing opportunities related to equitable transit-oriented development (TOD). Beginning in 2019 $4.0 million annual deposits will be made for five years to establish a $20 million fund.

  The reserve balance is projected to be $4.1M at the end of 2019. A contribution of $4.0 million is budgeted for 2020.

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Appendix A – Sound Transit 2 and Sound Transit 3 Cost Estimates

The agency maintains cost estimates for all of its capital projects that are funded in the agency's financial plan. These estimates are updated as new engineering, right-of-way, public outreach, and other project information are developed. Project cost estimates are updated prior to seeking Board authorization of budgets for preliminary engineering, final design and right-of-way acquisition, and baseline budget, which includes total project costs and construction.

ST2 cost estimates were initially developed and reported in 2007 constant-year dollars. ST3 cost estimates were initially developed and reported in 2015 constant-year dollars. To enable comparisons between cost estimates, the figures in this appendix have been updated to 2019 constant-year dollars based on the agency's August 2019 inflation forecasts.

The table on the next page includes the following information:

- Original cost estimates are from the initial plans approved by voters in November 2008 (ST2) and November 2016 (ST3).
- 2020 cost estimates match the proposed 2020 TIP.
- 2020 cost estimates include all ST2 and ST3 projects currently funded in the agency's financial plan.
- All voter-approved ST3 projects were added to Appendix A.
- The Federal Way Link Extension project is increased to reflect the addition of scope to extend the project to Federal Way Transit Center.

CAPITAL COST ESTIMATES
(in thousands/constant 2019 dollars)

	Voter Approved Estimate	Inc / (Dec) from Voter Approved	2019 Estimate	Inc / (Dec)	2020 Estimate
Link Light Rail					
East Link Extension	$ 4,019,793	$ (320,506)	$ 3,699,287	$ -	$ 3,699,287
Northgate Link Extension	$ 2,096,368	$ 164,012	$ 2,260,380	$ -	$ 2,260,380
Lynnwood Link Extension	$ 1,968,722	$ (290,982)	$ 1,677,740	$ -	$ 1,677,740
First Hill Streetcar	$ 154,859	$ (1,377)	$ 153,482	$ -	$ 153,482
South 200th Link Extension	$ 485,394	$ 10,721	$ 496,115	$ -	$ 496,115
South 200th to KDM Rd	$ 594,301	$ (594,301)	$ -	$ -	$ -
KDM Rd to S 272nd St	$ 644,918	$ (644,918)	$ -	$ -	$ -
Federal Way Link Extension	$ 1,254,390	$ 525,080	$ 1,779,470	$ -	$ 1,779,470
S 272nd to Tacoma Dome - ROW	$ 72,822	$ (72,822)	$ -	$ -	$ -
South Corridor Alternatives Analysis	$ 92,956	$ (89,506)	$ 3,450	$ -	$ 3,450
Hilltop Tacoma Link Extension	$ 120,542	$ 38,381	$ 158,923	$ -	$ 158,923
Link Operations & Maintenance Facility - East	$ 367,198	$ 98,228	$ 465,426	$ -	$ 465,426
Light Rail Vehicle Fleet Expansion	$ 654,203	$ 73,677	$ 727,880	$ -	$ 727,880
Downtown Seattle Light Rail Tunnel	$ 2,103,944	$ -	$ 2,103,944	$ -	$ 2,103,944
West Seattle Link Extension	$ 1,882,180	$ (9,097)	$ 1,873,083	$ -	$ 1,873,083
Ballard Link Extension	$ 3,137,594	$ (20,712)	$ 3,116,882	$ -	$ 3,116,882
Graham Street Infill Station	$ 89,037	$ (353)	$ 88,684	$ -	$ 88,684
Boeing Access Road Infill Station	$ 159,632	$ (797)	$ 158,835	$ -	$ 158,835
Downtown Redmond Link Extension	$ 1,242,278	$ 24,538	$ 1,266,816	$ -	$ 1,266,816
NE 130th Street Infill Station	$ 79,705	$ (446)	$ 79,259	$ -	$ 79,259
Everett Link Extension	$ 3,707,680	$ (18,240)	$ 3,689,440	$ -	$ 3,689,440
Issaquah Link Extension	$ 2,325,152	$ (11,130)	$ 2,314,022	$ -	$ 2,314,022
Link Operations & Maintenance Facility - North	$ 916,755	$ (3,368)	$ 913,387	$ -	$ 913,387
Link Operations & Maintenance Facility - South	$ 651,892	$ (3,361)	$ 648,531	$ -	$ 648,531
Tacoma Dome Link Extension	$ 2,444,061	$ (12,999)	$ 2,431,062	$ -	$ 2,431,062
Tacoma Community College Extension	$ 581,272	$ (2,569)	$ 578,703	$ -	$ 578,703
ST3 Light Rail Vehicle Fleet Expansion	$ 1,538,653	$ (229,918)	$ 1,308,735	$ -	$ 1,308,735
Total Link Light Rail	**$ 33,386,301**	**$ (1,392,764)**	**$ 31,993,537**	**$ -**	**$ 31,993,537**

CAPITAL COST ESTIMATES
(in thousands/constant 2019 dollars)

Sounder Commuter Rail					
Sumner Station Improvements	$ 59,450	$ (4,605)	$ 54,845	$ -	$ 54,845
Puyallup Station Improvements	$ 84,810	$ (13,121)	$ 71,688	$ -	$ 71,688
Lakewood Station Improvements	$ 51,917	$ (7,718)	$ 44,199	$ -	$ 44,199
Kent Station Access Improvements	$ 43,166	$ 28,247	$ 71,412	$ -	$ 71,412
Auburn Station Access Improvements	$ 45,041	$ 20,778	$ 65,819	$ -	$ 65,819
Tacoma Dome Station Access	$ 19,098	$ (3,958)	$ 15,140	$ -	$ 15,140
South Tacoma Station Access	$ 53,968	$ (8,444)	$ 45,525	$ -	$ 45,525
Mukilteo Station	$ 15,511	$ (2,908)	$ 12,602	$ -	$ 12,602
Sounder South Access Improvement Program	$ 1,139,593	$ (1,729)	$ 1,137,864	$ -	$ 1,137,864
Edmonds and Mukilteo Station Parking and Access Improvements	$ 48,398	$ (205)	$ 48,194	$ -	$ 48,194
Sounder South Extension from Lakewood to DuPont	$ 390,413	$ (2,106)	$ 388,306	$ -	$ 388,306
Sounder Maintenance Base	$ 217,193	$ (26,317)	$ 190,875	$ -	$ 190,875
Sounder Yard Expansion	$ -	$ 24,571	$ 24,571	$ -	$ 24,571
Tukwila Permanent Station	$ 47,435	$ 13,281	$ 60,716	$ -	$ 60,716
Edmonds Permanent Station	$ 33,230	$ (33,230)	$ -	$ -	$ -
Sounder South Expanded Service	$ 298,229	$ 80,935	$ 379,163	$ -	$ 379,163
Sounder ST2 Fleet Expansion	$ 41,314	$ 10,390	$ 51,704	$ -	$ 51,704
Tacoma Trestle Track & Signal	$ 92,061	$ 83,477	$ 175,538	$ -	$ 175,538
Tacoma Track & Signal	$ 35,880	$ (359)	$ 35,521	$ -	$ 35,521
Platform Extensions - South King / Pierce	$ 71,020	$ (71,020)	$ -	$ -	$ -
Eastside Rail Partnership	$ 64,553	$ (64,551)	$ 2	$ -	$ 2
Total Sounder Commuter Rail	**$ 2,852,278**	**$ 21,408**	**$ 2,873,686**	**$ -**	**$ 2,873,686**
Bus Rapid Transit					
I-405 Bus Rapid Transit	$ 1,041,671	$ (4,884)	$ 1,036,788	$ -	$ 1,036,788
Bus Rapid Transit Maintenance Base	$ 194,109	$ (677)	$ 193,433	$ -	$ 193,433
SR 522 Bus Rapid Transit	$ 482,940	$ (1,995)	$ 480,945	$ -	$ 480,945
Total Bus Rapid Transit	**$ 1,718,721**	**$ (7,555)**	**$ 1,711,166**	**$ -**	**$ 1,711,166**
Regional Express			$ -		$ -
ST Express Bus Base	$ 242,876	$ (8,219)	$ 234,657	$ -	$ 234,657
Mid-Day Bus Storage	$ -	$ 3,448	$ 3,448	$ -	$ 3,448
ST Express ST2 Fleet Expansion	$ 46,008	$ 18,964	$ 64,972	$ -	$ 64,972
North Sammamish Park-and-Ride	$ 24,254	$ (64)	$ 24,190	$ -	$ 24,190
Pacific Ave SR 7 Bus Corridor	$ 71,630	$ (1,815)	$ 69,815	$ -	$ 69,815
Bus on Shoulder Project	$ 123,415	$ -	$ 123,415	$ -	$ 123,415
Investments SR 162	$ 40,488	$ (180)	$ 40,308	$ -	$ 40,308
STEX Fleet to support Interim STEX Service	$ 21,801	$ -	$ 21,801	$ -	$ 21,801
RapidRide C and D	$ 78,647	$ (870)	$ 77,777	$ -	$ 77,777
I-90 Contribution	$ 64,584	$ -	$ 64,584	$ -	$ 64,584
Burien Transit Center/ Parking Garage	$ 19,196	$ (1,582)	$ 17,613	$ -	$ 17,613
Bothell Transit Related Improvements	$ 7,174	$ (7,174)	$ -	$ -	$ -
Total Regional Express	**$ 740,074**	**$ 2,508**	**$ 742,582**	**$ -**	**$ 742,582**
Other			$ -		$ -
ST3 Planning	$ 59,689	$ (25,082)	$ 34,607	$ -	$ 34,607
Innovation and Technology Fund	$ 84,865	$ -	$ 84,865	$ -	$ 84,865
Transit Oriented Development	$ 24,406	$ -	$ 24,406	$ -	$ 24,406
System Access Program	$ 113,154	$ -	$ 113,154	$ -	$ 113,154
Sumner to Orting Study	$ 5,658	$ -	$ 5,658	$ -	$ 5,658
Future System Planning (ST4)	$ 74,795	$ -	$ 74,795	$ -	$ 74,795
HCT Planning Studies	$ 51,204	$ -	$ 51,204	$ -	$ 51,204
STArt Program	$ -	$ 158,653	$ 158,653	$ -	$ 158,653
Total Other	**$ 413,771**	**$ 133,571**	**$ 547,342**	**$ -**	**$ 547,342**
TOTAL Capital Plan Estimate	**$ 39,111,145**	**$ (1,242,833)**	**$ 37,868,312**	**$ -**	**$ 37,868,312**

Note:
The cost estimates included in the table above reflect the amount funded in the Agency's long-term Financial Plan. Projects proposed to proceed with only limited engineering activity are funded only to the extend that activtiy requires. Projects proposed to be suspended or deleted have no funding in the current Long-term Financial Plan.

Appendix B – Sound Move Project Budgets

The agency has three voter-approved system expansion programs: Sound Move approved in 1996; Sound Transit 2 (ST2) approved in 2008; and Sound Transit 3 (ST3) approved in 2016. Appendix A reflects the cost estimates in constant-year dollars for all capital projects. This appendix displays adopted project budgets in year-of-expenditure dollars for active Sound Move system expansion projects.

Project budgets for Sound Move projects were adopted as total project budgets/baseline budgets, since these projects pre-date the agency's Phase Gate process. As with the ST2 and ST3 projects in Appendix A, Sound Move project budgets are shown for 2008, 2019, and 2020.

There were no changes between 2019 and 2020.

Regional Express

- Note: The I-90 Two-Way Transit and HOV Operations, Stage 3 project was baselined in 2014. This project is funded by Sound Move & ST2, Regional Express Reserve, and agency financial capacity.

I-90 TWO-WAY AND HOV OPERATIONS, STAGE 3 TOTAL FUNDING
(in thousands)

Sound Move	$64,222
I-90 Contribution (ST2)	45,000
REX Program Reserve	27,126
Agency Financial Capacity	89,300
Total Project Cost	**$225,648**

ADOPTED ALLOCATIONS TO DATE FOR ACTIVE SOUND MOVE PROJECTS
(YOE$ in thousands)

	2008	Inc/(Dec)	2019	Inc/(Dec)	2020
Link Light Rail					
University Link	$ 1,614,007	$ 142,000	$ 1,756,007	$ -	$ 1,756,007
Total Link Light Rail	**1,614,007**	**142,000**	**1,756,007**	**-**	**1,756,007**
Sounder Commuter Rail					
D Street to M Street Track and Signal	76,025	82,237	158,262	-	158,262
Mukilteo Station, South Platform	9,371	8,942	18,313	-	18,313
Tukwila Station (see Notes)	-	-	-	-	-
Total Sounder Commuter Rail	**85,396**	**91,179**	**176,575**	**-**	**176,575**
Regional Express					
I-90 2-Way Transit & HOV Op, Stage 3 (see note)	1,722	223,926	225,648	-	225,648
Total Regional Express	**1,722**	**223,926**	**225,648**	**-**	**225,648**
Total Active Sound Move Projects	**$ 1,701,125**	**$ 457,105**	**$ 2,158,230**	**$ -**	**$ 2,158,230**

Notes: Numbers may not add due to rounding.

Tukwila Station is a project recognized in ST2, but Sound Move did fund the project through Final Design.

I-90 2-Way Transit and HOV Op, Stage 3 is recognized in Sound Move, but ST2 contributed $45 million of planned funding.

The agency used $89.3 million of financial capacity to fully fund the project and the balance of the REX program reserve of $27.2 million.

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Appendix C - Glossary

ADA (Americans with Disabilities Act) – Federal law passed in 1990 that prohibits discrimination in services, facilities, and employment against individuals with disabilities.

Adopted Annual Budget – The proposed annual budget and associated revisions adopted by the Board before the beginning of the fiscal year, plus any one-time actions that the agency's Budget Policy authorizes the CEO to take after the Board adopts the annual budget and transit improvement plan (TIP) and before publication of the adopted annual budget document.

Adopted Transit Improvement Plan (TIP) – The TIP is the cumulative total of authorized project allocations to date for all active projects. The adopted TIP is the proposed TIP and associated revisions adopted by the Board, plus any one-time actions that the Budget Policy authorizes the CEO to take after the Board adopts the annual budget and TIP resolution.

Annual Budget – A plan for the agency's revenue and expenditures for a fiscal year.

Annual Budget and TIP Resolution – Board-adopted resolution that establishes annual spending authority and divides spending totals into categories such as operating including transit modes, projects by type, and debt service, plus an annual revenue forecast. It also establishes the authorized project allocation to date for projects included in the TIP and not approved by separate Board resolution.

Annual Operating Budget – The board-authorized agency operating expenditures. The agency maintains operating budgets at five levels:

- ***Agency* –** Total agency operating expenditures.
- ***Department* –** All operating expenditures managed by a department (e.g., DECM, Operations, Executive). Included in agency budget document.
- ***Division* –** All operating expenditures managed by a division (e.g., Construction Management, Environmental & Sustainability, Human Resources, Service Planning,). Not included in agency budget document but maintained and monitored within agency financial systems.
- ***Business Unit* –** All operating expenditures for smallest organization component. Not included in agency budget documents but maintained and monitored within agency financial systems.
- ***Modal* –** All operating expenditures for a transit mode: Sounder commuter rail, ST Express bus, Tacoma Link, and Link light rail. Included in agency budget document.

Annual Project Budget – The amount of project costs expected to be incurred during the budget year.

Authorized Project Allocation to Date – The current Board-authorized spending ceiling for a project.

Average Weekday Boardings – Number of one-way passenger movements (trips) between two points on a single vehicle on all routes on an average weekday.

Baseline – The project scope, schedule, and budget against which actual performance is measured; used for management control and reporting purposes.

Baseline Budget – The total budget to complete all phases of a project approved by the Board as a benchmark for performance and reporting purposes in year of expenditure dollars. A project may set a new baseline if there is a change in the scope of the project. However, a project baseline is not adjusted to account for cost overruns or underruns.

BNSF – Burlington Northern Santa Fe Railway, the railroad company that contractually operates Sounder, Sound Transit's commuter rail service.

Board – The Sound Transit Board of Directors, made up of 18 members: 17 elected officials from local jurisdictions within the Sound Transit district and the Secretary of the Washington State Department of Transportation.

Boarding – The number of one-way passenger trips between two points on a single vehicle. Also synonymous with unlinked passenger trip, rider, or passenger.

Budget authority – The authority granted by the board to spend a given amount of money for a certain purpose.

Capital Asset – Individual assets costing $5,000 or more and having useful lives greater than one year. Also, significant alterations, renovations, or structural changes that increase the usefulness of a Sound Transit owned asset, enhance its efficiency, or prolong its useful life by more than one year.

Capital Outlay – An expense that results in the acquisition of or addition to fixed assets.

Capital Project Cost Estimate – The current estimated project cost from inception to completion, as maintained and updated at engineering milestones by agency Project Controls. Maintained in constant dollars.

Capital Projects – Projects that purchase or construct capital assets.

Catenary – Suspended overhead wire that carries high voltage for electrically-powered transit vehicles (such as light rail) from a central power source.

CCTV (**Closed Circuit Television)** – Cameras installed aboard transit vehicles and at passenger stations for security purposes.

COM – Communications department.

CEO – Chief Executive Officer of Sound Transit who reports directly to the Board of Directors.

COLA (Cost-of-Living Adjustment) – Refers to the annual percentage increase applied to an employee's salary for inflationary factors.

Commuter Rail – Railway for urban passenger train service consisting of local short distance travel operating between a central city and adjacent suburbs.

Complaints per 100,000 Boardings – The performance metric (calculated for each mode) that measures the number of service complaints per 100,000 passenger boardings.

- ***Complaints per 100,000 Boardings –*** *Calculation = [(Service Complaints Received/ Modal Passenger Boardings) * 100,000]*

Contingency – A budgetary reserve put aside for emergencies or unforeseen expenses.

COP (**Citizen Oversight Panel)** – An independent panel of 15 volunteers appointed by the Board of Directors representing each of Sound Transit's five subareas. Its mission is to monitor the agency's commitment to the public, reviewing projects, budgets, and performance, and reporting its findings and recommendations for improvement to the Board.

Cost per Boarding – Calculated for each mode, this metric represents the fully allocated cost of providing service to a passenger.

- ***Cost per Boarding –*** *Calculation = (Modal Operating Expenses/Modal Passenger Boardings)*

Cost per Platform Hour – Calculated for each mode, this metric measures the fully allocated cost of providing one hour of service, inclusive of revenue and non-revenue time.

- ***Cost per Platform Hour*** *– Calculation = (Modal Operating Expenses/Modal Platform Hours)*

Cost per Revenue Vehicle Hour – Calculated for each mode, this metric represents the fully allocated cost of providing one revenue vehicle hour of service.

- ***Cost per Revenue Vehicle Hour*** – *Calculation = (Modal Operating Expense/Modal Revenue Vehicle Hours)*

CPI (Cost Performance Index) – A measure of the value of the work completed compared to the actual cost or progress made on the project.

DB (Design-Build) – A procurement method used to minimize design and construction risks while reducing the project delivery schedule by overlapping the design phase and construction phase of a project. Using DB, the owner contracts with a single entity for all engineering, design, and construction services for a transit facility/system.

Deadhead – The amount of non-revenue service time or miles when a bus or train is not carrying revenue passengers, usually a trip from, to, or between lines, yards, or garages.

Debt Service – The payment of interest and the repayment of principal on long-term borrowed funds according to a predetermined schedule.

DECM – Design, Engineering & Construction Management department.

Department – Highest organizational unit of Sound Transit, consisting of: Communications & External Affairs; Design, Engineering & Construction Management; Executive; Finance; Information Technology; Legal; Operations; Planning, Environment & Project Development; and Safety.

Depreciation – A method by which the costs of property and equipment are systematically and rationally allocated over their useful life.

Division – Organizational sub-unit within departments.

DSTT – Downtown Seattle Transit Tunnel.

EIS (**Environmental Impact Statement)** – A study of the impacts of a major project on the environment and surrounding areas, required for any capital construction project for which federal funds are used.

Expense – A decrease in net current assets. Expenses include salaries and benefits, administrative expenses, debt service, and those current operating costs that require the use of current assets.

Farebox Recovery – Calculated for each mode collecting fares, this metric represents the percentage of operating cost of each mode that is paid by transit riders.

Farebox Recovery – *Calculation = (Modal Passenger Fare Revenue/Modal Operating Expenses).*

FCC – Federal Communications Commission.

Financial Plan Project Estimate – The current estimated project cost from inception to completion, as maintained and updated annually in the agency's financial plan. Maintained in inflation adjusted year of expenditure dollars.

Financial Plan Total Capital Project Cost Estimate – The current estimated project cost from inception to completion, as maintained and updated at engineering milestones. Maintained in constant dollars.

Fiscal Year – A 12-month period for calculating annual financial statements. Sound Transit's fiscal year is January 1 to December 31.

FIT – Finance & Information Technology department.

FTA (Federal Transit Administration) – The federal agency responsible for the administration of federal transit programs, including the allocation of grant funds. FTA is a part of the U.S. Department of Transportation.

FTE (**Full Time Equivalen**t) – The fractional equivalent of one full-time employee working a 40-hour work week for one calendar year.

FY – Fiscal Year.

GCCM (General Contractor/Construction Manager) – A procurement method used to reduce construction risk. Using GCCM, the owner has access to construction expertise and experience prior to completion of design. Services offered by a GCCM contractor include assistance with decision-making, constructability reviews, value engineering, budget control, cost estimating, and schedule control.

GFOA (**Government Finance Officers Association)** – An organization whose purpose is to enhance and promote the professional management of governments for the public's benefit by identifying and developing financial policies and practices and promoting them through education, training, and leadership.

GIS – Geographic Information Services.

HCT (**High Capacity Transit)** – Public transportation within an urbanized region operating principally on exclusive rights of way, including interim express services and high occupancy vehicle lanes, which taken as a whole, provides a substantially higher level of passenger capacity, speed, and service frequency than traditional public transportation systems operating principally in general purpose roadways.

HOV (**High-Occupancy Vehicle)** – A vehicle containing two or more passengers. Occupancy designations are used on designated auto traffic lanes to encourage car-pooling, ride sharing, or the use of public transportation.

IT – Information Technology.

KCM (**King County Metro)** – The public transit division of King County Department of Transportation, responsible for providing bus, trolley bus, light rail, water taxi, paratransit, and vanpool services in a service area of about 2,000 square miles. Sound Transit contracts a portion of its express bus service as well as all of its light rail service with KCM.

Light Rail – Service using trains powered with overhead catenary power, operating on tracks embedded in city streets or along a separate right-of-way. Passengers are picked up and discharged at fixed locations (stations) located along the tracks.

LRV (Light Rail Vehicle) – A vehicle with overhead catenary power operating on tracks. It may be connected to other vehicles and operated as a train.

MMIS (Maintenance Management Information System) – The Maintenance Management Information System is an online system that helps gather and analyze data about an organization's maintenance operations with the intention of helping management make informed decisions and staff do their jobs more effectively.

Mode – A system for carrying transit passengers described by specific right-of-way, technology, and operational features. Sound Transit modes are light rail, commuter rail, and regional express bus.

MVET (**Motor Vehicle Excise Tax)** – Also called the "car tab" tax; this is a tax on vehicles based on the depreciated value of the vehicle using the Manufacturer's Suggested Retail Price (MSRP) as the initial vehicle value. The tax on commercial trucks and trailers is based on the depreciated value using the latest purchase price and year as the initial vehicle value. Sound Transit currently assesses a 0.3 percent MVET within its taxing district.

NRV (Non-Revenue Vehicles) – Agency fleet consisting of cars, trucks, vans, SUVs, specialty vehicles, and equipment used for administrative purposes.

O&M – Operations and Maintenance.

OMF – Operations Maintenance Facility.

On-Time Performance – A performance ratio that measures how often a transit service is on time (i.e., at a designated pick-up spot within a predetermined timeframe). The timeframe differs based on mode and frequency of service.

- ***On-Time Performance –*** *Calculation = ((# Scheduled Trips – # Trips Early or Late)/Total # of Scheduled Trips).*

Operating expenses – Ongoing costs to deliver public transportation services and provide administrative support to the agency.

ORCA (One Regional Card for All) – A stored-value smart card used for payment of public transit fares in the Central Puget Sound region.

Paratransit – The comparable transportation service required by the ADA for individuals with disabilities who are unable to use fixed-route (bus and rail) service. The vehicles used do not operate over a fixed route or on a fixed schedule.

PE/ED – Preliminary Engineering and Environmental Documentation

PEPD – Planning, Environment & Project Development department

Percentage of Scheduled Trips Operated – A performance ratio that measures the number of times a Sound Transit vehicle or mode of service completes its scheduled route/trip

Phase Gate Process – Project management oversight and project budget approval process to ensure projects are ready to advance to a subsequent phase. Intended to enhance Board visibility into projects and control over key project decisions. The Phase Gate process triggers requests to the Board for Phase Gate project budget and other actions.

PLA (Project Labor Agreement) – PLAs are collective bargaining agreements between building trade unions and contractors. They govern terms and conditions of employment for all craft workers – union and nonunion – on a construction project.

Platform Hours (also called Service Hours) – For any mode, the total time the operator operates the vehicle, including revenue service (scheduled route, special event, and layover time) and non-revenue service (pullout and pull-in times from first/last stop to garage).

Platform Miles (also called Service Miles) – For any mode, the total miles traveled by a vehicle from pullout of garage/yard to return to garage/yard at end of revenue service, including any layover time and time when not carrying passengers.

Preventable Accidents per 100,000 Revenue Miles – For any mode, the number of preventable accidents reported per 100,000 miles of actual revenue vehicle mileage. A preventable accident is one in which the driver failed to do everything that reasonably could have been done to avoid the crash.

- ***Preventable Accidents per 100,000 Revenue Miles*** *– Calculation = (Preventable Accidents / Actual Revenue Mileage) * 100,000*

Project Budgeting

- ***Authorized Project Allocation to Date*** – The current board-authorized spending ceiling for a project. For example, when the board authorizes a change to the authorized project allocation to date, this is not a budget amendment but rather an increase or a decrease to the authorized project allocation to date.

- ***Baseline Budget*** – The total budget to complete all phases of a project approved by the board as a benchmark for performance and reporting purposes in year of expenditure dollars. A project may set a new baseline if there is a change in the scope of the project. However, a project baseline is not adjusted to account for cost overruns or underruns.
- ***Capital outlay*** – An expenditure that results in the acquisition of, creation of, or addition to fixed assets.
- ***Project*** – A discrete body of work that has a scope, schedule, and budget approved by the board.
- ***Project Amendment*** – A change to an authorized project allocation to date for a previously established phase budget or baseline. Generally triggered by a cost overrun or underrun.
- ***Rebaselined Budget*** – The Board-adopted change to a previously adopted baseline budget. This occurs when new scope elements have been included in a project that were not previously part of the project baseline. In order to maintain clear cost management accountability, projects are not rebaselined when project cost elements are higher than previously estimated.

Project Cost Phases – A defined set of categories to budget and track project costs. These are distinct groupings of project activities, typically project development, design, and construction.

- 01 – Operations + Maintenance
- 02 – Operations + Maintenance - Agency
- 09 – Administrative Capital
- 10 – Agency Administration
- 20 – Preliminary Engineering &
- 22 – Environmental Review
- 26 – Research & Technology
- 30 – Final Design & Specifications
- 35 – Third Parties
- 40 – Right of Way Acquisition
- 50 – Construction
- 55 – Construction Services
- 61 – Art
- 70 – Vehicles
- 80 – Startup and Testing
- 90 – Project Contingency

Project Type – A category name used to identify projects of a similar nature. Sound Transit has four project types:

- ***Administrative*** – Projects that support administration of the agency. The majority of these costs are capitalized with the assets produced by projects or expensed as transit operating costs. Remaining costs are treated as general and administrative expenses.
- ***Enhancement*** – Projects that improve operating efficiency and effectiveness, improve rider experience, increase system functionality, or reduce operating costs.
- ***State of Good Repair*** – Projects that extend the life of existing system assets and replace those at the end of their useful life; investment in maintaining assets in a state of good repair.
- ***System Expansion*** – Projects that expand the current regional transit system including planning, design, and construction of light rail, commuter rail, and express bus transit infrastructure.

Proposed Annual Budget – The initial annual operating and project budget as submitted by the CEO to the Board for its consideration and adoption.

Proposed Transit Improvement Plan (TIP) – The TIP is the cumulative total of authorized project allocations to date for all active projects. The proposed TIP is the initial submission to the Board for their review and adoption.

Purchased Transportation – Transportation service provided to a public transit agency from a public or private transportation provider, based on a written contract.

Reserve – Cash set aside to support unplanned expenditures, such as an insurance deductible or a period of operating expenses in the case of lost revenues.

Revenue Vehicle Hours – The number of hours that a vehicle is in revenue service and there is a reasonable expectation of carrying passengers (includes layover time, but not deadhead).

Revenue Vehicle Miles – The number of miles that a vehicle is in revenue service and there is a reasonable expectation of carrying passengers (includes layover time, but not deadhead).

Revenues – Increases in proprietary fund type net total assets from other than expense refunds and capital contributions.

ROW (Right-of-Way) – A right-of-way is a right to make a way over a piece of land, usually to and from another piece of land. A right of way is a type of easement granted or reserved over the land for transportation purposes. Also used to describe the land on which a railroad line, road, or utility is built.

Sales Tax – A 0.9 percent tax levied on sales of eligible items within the boundaries of the Sound Transit District and collected by the State for the benefit of Sound Transit.

SCADA (Supervisory Control and Data Acquisition) – A centralized system to control signals, systems, and substations on Sound Transit's light rail system. The system also provides real-time location data to a control center.

Service Hours (also called Platform Hours) – For any mode, the total time the operator operates the vehicle, including revenue service (scheduled route, special event, and layover time) and non-revenue service (pullout and pull-in times from first/last stop to garage).

Service Implementation Plan (SIP) – Board-adopted document that details six-year transit mode service levels and operating expenses. SIP is a planning document and does not constitute authorization for expenditure of funds.

Service Miles (also called Platform Miles) – For any mode, the total miles traveled by a vehicle from pullout of garage/yard to return to garage/yard at end of revenue service, including any layover time and time when not carrying passengers.

Smart Card – A small card, usually plastic, with an imbedded computer chip good for one or more trips that is usually altered by a fare collection machine removing some or all of the stored value as each trip is taken.

SODO – The general area south of downtown Seattle; also, the name of one of Sound Transit's light rail stations located in that neighborhood.

Sound Move – Voter-approved plan (1996) to build a high-capacity public transit system.

Sound Transit – The Central Puget Sound Regional Transit Authority.

SPI (Schedule Performance Index) – A measure of schedule efficiency on a project. It is the ratio of earned value (EV) to planned value (PV).

SR – State Route.

ST2 (**Sound Transit 2)** – Voter-approved (2008) second phase of Sound Transit's plan for mass transit expansion.

ST3 (**Sound Transit 3)** – The third phase of Sound Transit's plan for mass transit expansion.

ST*art* (**Sound Transit Art Program)** – Program whose purpose is to incorporate public art into Sound Transit systems and facilities that will reflect the communities served and enhance the customer experience.

Stride – Sound Transit's future Bus Rapid Transit service providing limited-stop regional service connecting riders with major urban and employment centers in King County. Bus Rapid Transit service will utilize new park-and-ride lots, transit centers, and high occupancy vehicle (HOV) access ramps.

STU (Sound Transit University Program) – Refers to a range of training courses, both on-site and off-site, offered for Sound Transit employees to improve professional and technical skills.

Subarea – Five subareas of the Sound Transit District defined for planning and budgeting purposes consisting of Snohomish County, North King County, East King County, South King County, and Pierce County.

System Plan – (see Sound Move).

TCO (Total Cost of Ownership) – A financial estimate intended to help buyers and owners determine the direct and indirect costs of a product or system.

TGT (Technology Governance Team) – Team of Sound Transit employees who provide leadership and direction for the Information Technology (IT) division to ensure reliable, consistent, cost-effective, and accountable services.

TIFIA (Transportation Infrastructure Financing and Innovation Act) – A direct loan, loan guarantee, and standby line of credit program allowing the USDOT to provide credit assistance of up to 33 percent of the construction costs of a regionally or nationally significant surface transportation project. Loans are made at U.S. Treasury rates and may be repaid over as long as 35 years after substantial completion of the project.

TIP (**Transit Improvement Plan)** – This document provides projected capital and operating expenditures for the construction and operation of the Sound Transit regional transit system in the central Puget Sound. The TIP contains information on scope and budget as well as changes in budget and schedule for all active phases of both capital and operating programs.

TOD (Transit-Oriented Development) – The development of residential, commercial, and retail uses within walking distance of a transit station or stop.

TPSS (Traction Power Sub Station) – A wayside unit that converts electric power from the form provided by the public utility to an appropriate voltage, current type, and frequency to supply traction power to the motor of the light rail vehicle through the overhead catenary.

Transit Improvement Plan (TIP) – **Adopted TIP –** The proposed TIP and associated revisions adopted by the board, plus any one-time actions that the Budget Policy authorizes the CEO to take after the board adopts the annual TIP.

Transit Improvement Plan (TIP) – **Proposed TIP –** The initial submission of the TIP to the board for review.

Transit Improvement Plan (TIP) – The cumulative total of authorized project allocations to date for all active projects, six-year forecasts of operating expenses for each transit mode, and contributions to reserves.

Transit mode – A system for carrying transit passengers described by specific right-of-way, technology and operational features, such as light rail, commuter rail, bus or streetcar.

TVM (**Ticket Vending Machine)** – Automated equipment located at customer facilities that enable the purchase of fare media for access to the Sound Transit transportation system.

UPS – Uninterrupted Power Supply

UW – University of Washington

Variance – The difference between planned costs and actual costs.

WSDOT – Washington State Department of Transportation

YOE (**Year of Expenditure)** – Refers to the representation of a project's cost inclusive of an annual inflationary factor calculation.

Appendix D - Project Detail Pages

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2020 Cashflow by Budget Approval

(in thousands)

System Expansion

LINK

Project Number and Name		Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Preliminary Engineering										
400034	Enhancements to Tacoma Link Extension	$1,500	$0	$0	$0	$500	$0	$0	$0	$2,000
400052	Everett Link Extension	3	14,560	27,897	32,657	41,195	34,200	34,530	0	185,042
400053	Tacoma Dome Link Extension	25,308	25,902	34,245	16,843	23,375	0	0	0	125,673
400066	West Seattle and Ballard Link Extensions	53,896	52,301	65,100	68,400	46,199	0	0	0	285,896
400113	North Corridor MOW	52	439	0	0	0	0	0	0	491
400115	NE 130th Street Infill Station	3,888	577	2,304	0	0	0	0	0	6,769
400117	DSTT Single Tracking	3,500	0	0	0	0	0	0	0	3,500
	Subtotal	88,147	93,779	129,546	117,900	111,269	34,200	34,530	0	609,371
Baseline										
400008	Hilltop Tacoma Link Extension	100,308	61,730	49,892	5,416	0	0	0	0	217,346
400009	Operations and Maintenance Facility East	288,499	68,050	20,070	7,236	60,250	5,116	0	0	449,220
400032	Light Rail Vehicle Fleet Expansion	174,041	137,235	129,258	106,945	103,628	88,954	372	286	740,718
4X100	Northgate Link Extension	1,569,107	126,148	78,355	22,737	103,408	0	0	0	1,899,756
4X115	Lynnwood Link Extension	605,224	504,702	543,778	544,809	438,434	126,056	8,619	0	2,771,622
4X200	University Link Extension	1,514,981	1,750	2,276	0	0	0	0	237,000	1,756,007
4X420	South 200th Link Extension	329,402	146	0	0	0	0	0	53,693	383,241
4X445	Federal Way Link Extension	364,409	313,935	334,008	310,809	329,010	408,966	171,245	219,153	2,451,535
4X600	East Link Extension	2,343,070	605,984	248,241	142,094	131,020	146,080	26,410	34,251	3,677,150
4X630	Downtown Redmond Link Extension	120,743	149,607	254,915	322,475	307,764	119,744	125,812	128,939	1,530,000
	Subtotal	7,409,783	1,969,287	1,660,793	1,462,521	1,473,514	894,916	332,457	673,324	15,876,595
Reserve										
4X199	Northgate Link Extension Project Reserve	0	0	0	0	50,000	0	0	0	50,000
	Subtotal	0	0	0	0	50,000	0	0	0	50,000
Operating										
400007	First Hill Streetcar	132,735	0	0	0	45	0	0	0	132,780
	Subtotal	132,735	0	0	0	45	0	0	0	132,780
	Total	$7,630,665	$2,063,066	$1,790,339	$1,580,421	$1,634,828	$929,116	$366,987	$673,324	$16,668,746

2020 Cashflow by Subarea

(in thousands)

System Expansion

LINK

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
1 - Snohomish	$413,296	$319,864	$341,633	$340,852	$300,274	$109,574	$33,850	$35	$1,859,379
2 - North King	3,659,727	462,533	433,648	367,555	437,150	85,468	4,182	237,291	5,687,554
3 - South King	783,525	356,823	370,132	334,487	364,672	421,690	171,294	272,885	3,075,508
4 - East King	2,650,534	839,009	565,002	512,371	507,688	303,891	152,217	163,103	5,693,814
5 - Pierce	123,528	82,495	75,470	19,951	18,519	3,113	13	10	323,100
6 - Systemwide	54	2,342	4,453	5,205	6,526	5,379	5,431	0	29,390
Total	$7,630,665	$2,063,066	$1,790,339	$1,580,421	$1,634,828	$929,116	$366,987	$673,324	$16,668,745

2020 Cashflow by Phase

(in thousands)

Phase # and Description	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
02-Operation+Maintenance-Agency	$52	$389	$0	$0	$0	$0	$0	$0	$441
10-Agency Administration	371,353	69,765	89,133	92,178	127,998	58,691	34,088	46,578	889,784
20-Prelim Engineering/Env Review	280,815	73,583	99,753	83,589	57,903	25,431	23,966	4,246	649,287
30-Final Design+Specifications	568,654	30,963	26,281	17,926	29,258	9,143	14,130	8,576	704,930
35-Third Party	205,418	15,616	21,372	19,863	22,406	10,051	10,509	13,870	319,104
40-Row Acquisition+Permits	1,006,107	154,799	80,776	22,115	56,601	107,552	5,090	107,706	1,540,745
50-Construction	4,540,141	1,456,869	1,235,945	1,155,905	1,057,741	566,538	240,514	465,367	10,719,020
55-Construction Services	378,150	106,666	83,863	80,999	78,793	47,792	37,783	20,768	834,813
70-Vehicles	268,119	144,600	144,075	103,350	100,000	85,192	0	4,716	850,052
80-System Testing+Startup	11,856	9,817	9,140	4,496	31,929	18,726	907	1,497	88,368
90-Contingency	0	0	0	0	72,200	0	0	0	72,200
Total	$7,630,665	$2,063,066	$1,790,339	$1,580,421	$1,634,828	$929,116	$366,987	$673,324	$16,668,746

System Expansion LINK

400007 First Hill Streetcar Managed by: PEPD

Provide a fixed amount of funding for the planning, design, and construction of an at-grade street car connecting Capitol Hill with the International District.

Changes to authorized project allocation since 2019: None.

Budget year activities: None.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$132,780
2019 TIP:	$132,780
2020 TIP:	$132,780

Completion Schedule	
Baseline:	2015
2019 :	2015
2020 :	2015

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$154,859
2019 Cost Estimate:	$153,482
2020 Cost Estimate:	$153,482

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$132,735	$0	$0	$0	$45	$0	$0	$0	$132,780
Total	$132,735	$0	$0	$0	$45	$0	$0	$0	$132,780

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$244	$0	$0	$0	$45	$0	$0	$0	$289
35-Third Party	132,491	0	0	0	0	0	0	0	132,491
Total	$132,735	$0	$0	$0	$45	$0	$0	$0	$132,780

Project Risk Assessment

N/A.

System Expansion LINK

400008 Hilltop Tacoma Link Extension Managed by: DECM

Plan, design, and construct a 2.4 mile extension of light rail from the Theatre District in downtown Tacoma to the Hilltop neighborhood. This extension will add 6 new stations, 5 new vehicles and the expansion of the Tacoma Link Operations and Maintenance facility. The new stations will be located at Old City Hall, South 4th Street, Stadium District, Tacoma General Hospital, 6th Avenue Hilltop District, and St Joseph Medical Center.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue construction work on mainline and at the operating and maintenance facility (OMF). Continue oversight of third party and vehicle manufacturing work. Execute scope with vendor for vehicle inspection services.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$217,346
2019 TIP:	$217,346
2020 TIP:	$217,346

Completion Schedule	
Baseline:	2022
2019 :	2022
2020 :	2022

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$120,542
2019 Cost Estimate:	$158,923
2020 Cost Estimate:	$158,923

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$100,308	$61,730	$49,892	$5,416	$0	$0	$0	$0	$217,346
Total	$100,308	$61,730	$49,892	$5,416	$0	$0	$0	$0	$217,346

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$10,620	$2,575	$2,366	$1,787	$0	$0	$0	$0	$17,348
20-Prelim Engineering/Env Review	5,559	0	0	0	0	0	0	0	5,559
30-Final Design+Specifications	11,081	1,395	296	26	0	0	0	0	12,798
35-Third Party	1,131	50	215	70	0	0	0	0	1,466
40-Row Acquisition+Permits	1,920	55	53	242	0	0	0	0	2,270
50-Construction	60,911	41,105	25,283	1,896	0	0	0	0	129,196
55-Construction Services	4,654	3,800	1,566	271	0	0	0	0	10,291
70-Vehicles	3,379	11,200	18,513	0	0	0	0	0	33,092
80-System Testing+Startup	1,053	1,550	1,600	1,123	0	0	0	0	5,326
Total	$100,308	$61,730	$49,892	$5,416	$0	$0	$0	$0	$217,346

Project Risk Assessment

There is risk of unidentified utility conditions under the proposed alignment potentially causing a delay in completion of these relocations. There is concern that roadway improvements and modifications along Martin Luther King Way are greater than anticipated requiring additional scope. budget and schedule uncertainty remains with utility relocations associated with the pedestrian passageways under Martin Luther King Way and unknown subsurface conditions under the proposed alignment or overhead catenary system pole locations.

System Expansion LINK

400009 Operations and Maintenance Facility East Managed by: DECM

Plan, design, and construct a light rail vehicle maintenance facility located in the City of Bellevue that will provide storage and maintenance capacity to support the light rail expansion within the east corridor.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue operation and maintenance facility design-build construction with associated support from design-build project management. Right-of-way activities will be minimal.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$449,220
2019 TIP:	$449,220
2020 TIP:	$449,220

Completion Schedule	
Baseline:	2020
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$367,198
2019 Cost Estimate:	$465,426
2020 Cost Estimate:	$465,426

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$60,585	$14,291	$4,215	$1,519	$12,653	$1,074	$0	$0	$94,336
North King	48,179	11,364	3,352	1,208	10,062	854	0	0	75,020
South King	55,392	13,066	3,853	1,389	11,568	982	0	0	86,250
East King	124,343	29,330	8,650	3,119	25,968	2,205	0	0	193,614
Total	$288,499	$68,050	$20,070	$7,236	$60,250	$5,116	$0	$0	$449,220

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$6,651	$1,850	$1,258	$715	$1,984	$5,116	$0	$0	$17,573
20-Prelim Engineering/Env Review	8,712	0	0	0	824	0	0	0	9,536
30-Final Design+Specifications	0	50	100	0	236	0	0	0	386
35-Third Party	125	0	500	0	2,482	0	0	0	3,107
40-Row Acquisition+Permits	101,959	50	50	4,291	28,179	0	0	0	134,529
50-Construction	161,305	61,600	17,162	1,730	22,956	0	0	0	264,753
55-Construction Services	9,747	4,500	1,000	500	3,590	0	0	0	19,337
Total	$288,499	$68,050	$20,070	$7,236	$60,250	$5,116	$0	$0	$449,220

Project Risk Assessment

Long lead procurements are delayed causing interruption to construction sequences in 2019. Interfaces with East Link and differing ground condition at construction ramp up could pose challenges.

System Expansion LINK

400032 Light Rail Vehicle Fleet Expansion Managed by: DECM

Plan, design, procure, inspect, and test 152 light rail vehicles. The vehicles will support revenue service for Northgate Link, East Link, Lynnwood Link, Federal Way Link and Downtown Redmond Link extensions.

Changes to authorized project allocation since 2019: None.

Budget year activities: Major milestone payments, acceptance and commissioning of initial delivery of 30 new LRVs.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$740,718
2019 TIP:	$740,718
2020 TIP:	$740,718

Completion Schedule	
Baseline:	2024
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$654,203
2019 Cost Estimate:	$727,880
2020 Cost Estimate:	$727,880

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$21,233	$16,743	$15,769	$13,047	$12,643	$10,852	$45	$35	$90,368
North King	51,864	40,896	38,519	31,870	30,881	26,508	111	85	220,734
South King	22,973	18,115	17,062	14,117	13,679	11,742	49	38	97,775
East King	71,879	56,678	53,383	44,168	42,798	36,738	153	118	305,917
Pierce	6,091	4,803	4,524	3,743	3,627	3,113	13	10	25,925
Total	$174,041	$137,235	$129,258	$106,945	$103,628	$88,954	$372	$286	$740,718

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2,646	$1,335	$1,360	$1,310	$1,340	$1,268	$82	$286	$9,627
55-Construction Services	5,848	2,500	2,335	2,285	2,288	2,495	289	0	18,040
70-Vehicles	165,547	133,400	125,563	103,350	100,000	85,192	0	0	713,051
Total	$174,041	$137,235	$129,258	$106,945	$103,628	$88,954	$372	$286	$740,718

Project Risk Assessment

Project risk centers on the timely completion and commissioning of the Operations and Maintenance Facility: East's (OMF-East) yard to receive the new LRVs. Coordination of the retrofitting of automatic train protection on the existing LRVs is critical to minimize impacts to Link operations; Difficulty in meeting the magnetic frequency and vibration standards may lead to production and delivery delays.

System Expansion — LINK

400034 — Enhancements to Tacoma Link Extension — Managed by: FIN

Create engineering and streetscape design for transit access improvements and station area enhancements around the Tacoma Link Extension project.

This project is also focused on job access needs and identifying barriers that currently limit the Tacoma Hilltop residents from participation in existing workforce training and apprenticeship programs. In 2016 the City of Tacoma and Sound Transit received a $2 million grant from the Federal Transit Administration for this project. Sound Transit is the designated recipient and needs to administer the grant while the City of Tacoma will execute the scope and provide $0.5 million in local matching funds.

The scope of this project is independent of the Tacoma Link Extension project.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project close out.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$2,000
2020 TIP:	$2,000

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$1,500	$0	$0	$0	$500	$0	$0	$0	$2,000
Total	$1,500	$0	$0	$0	$500	$0	$0	$0	$2,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$220	$0	$0	$0	$0	$0	$0	$0	$220
35-Third Party	1,280	0	0	0	500	0	0	0	1,780
Total	$1,500	$0	$0	$0	$500	$0	$0	$0	$2,000

Project Risk Assessment

N/A.

System Expansion — LINK

400052 — Everett Link Extension — Managed by: PEPD

Plan, design, and construct a 16.3 mile extension of light rail from Lynnwood Transit Center to Everett Station via at-grade and elevated alignment. The project includes six new stations at West Alderwood Mall, Ash Way, 128th /Mariner, Southwest Everett Industrial Center, SR 526/Evergreen and Everett Station. The project also includes one provisional station, at SR 99/Airport Road.

Changes to authorized project allocation since 2019: New project of $185 million to begin project development.

Budget year activities: Procure project development services consultant contract, complete Phase 1 alternatives development.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$185,042

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2036

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$3,707,680
2019 Cost Estimate:	N/A
2020 Cost Estimate:	$3,689,440

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$2	$12,270	$23,509	$27,520	$34,716	$28,821	$29,099	$0	$155,937
Systemwide	0	2,290	4,388	5,136	6,479	5,379	5,431	0	29,105
Total	$3	$14,560	$27,897	$32,657	$41,195	$34,200	$34,530	$0	$185,042

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$3	$3,899	$5,406	$5,600	$7,397	$5,749	$6,116	$0	$34,170
20-Prelim Engineering/Env Review	0	10,403	19,642	22,636	25,637	23,630	23,624	0	125,572
35-Third Party	0	258	1,508	2,354	3,897	2,451	2,732	0	13,200
40-Row Acquisition+Permits	0	0	1,341	2,067	4,264	2,370	2,058	0	12,100
Total	$3	$14,560	$27,897	$32,657	$41,195	$34,200	$34,530	$0	$185,042

Project Risk Assessment

N/A.

System Expansion — LINK

400053 — Tacoma Dome Link Extension — Managed by: PEPD

Plan, design, and construct a 9.7 mile extension of light rail from Federal Way to Tacoma via at-grade or elevated alignment. Stations will be located at Federal Way Transit Center, South Federal Way, Fife, East Tacoma, and the Tacoma Dome.

The project includes the planning of a light rail maintenance facility (OMF-South) to add storage and maintenance capacity in support the expansion of light rail on the Federal Way to Tacoma corridor. Upon the completion of the environmental impact statement (EIS), the OMF-South will transition to a stand-alone project.

Changes to authorized project allocation since 2019: None.

Budget year activities: Conduct technical analysis of the preferred alternatives and other station and alignment options in preparation for final drafts of the Draft Environmental Impact Statement (DEIS) by the end of 2020 for publication to the public in early 2021. Evaluate three OMF sites with a goal of seeking a Board preferred alternative by Q4 2020.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$125,673
2020 TIP:	$125,673

Completion Schedule	
Baseline:	N/A
2019 :	2030
2020 :	2030

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$2,444,061
2019 Cost Estimate:	$2,431,062
2020 Cost Estimate:	$2,431,062

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$10,326	$10,568	$13,972	$6,872	$9,537	$0	$0	$0	$51,275
Pierce	14,982	15,334	20,273	9,971	13,838	0	0	0	74,398
Total	$25,308	$25,902	$34,245	$16,843	$23,375	$0	$0	$0	$125,673

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$6,035	$3,831	$4,475	$5,029	$7,478	$0	$0	$0	$26,848
20-Prelim Engineering/Env Review	18,393	20,129	28,106	10,153	10,295	0	0	0	87,075
35-Third Party	680	1,042	1,014	1,011	2,003	0	0	0	5,750
40-Row Acquisition+Permits	200	900	650	650	3,600	0	0	0	6,000
Total	$25,308	$25,902	$34,245	$16,843	$23,375	$0	$0	$0	$125,673

Project Risk Assessment

Continue to reduce our risk for crossing the Puyallup River by further design of a clear span that eliminates any piers in the river. Refine the use of the WSDOT Right of Way to maximize the ROW remaining for WSDOT while minimizing the permanent impact on adjoining private properties. Evaluate three Board directed sites of the OMFS in the DEIS with environmental challenges at all three sites.

System Expansion — LINK

400066 — West Seattle and Ballard Link Extensions — Managed by: PEPD

Extension of light rail approximately 4.7 miles from Downtown Seattle to the Alaska Junction neighborhood of West Seattle via elevated and at-grade alignment and approximately 5.4 miles from Downtown Seattle to Ballard via elevated guideway and tunnel. Includes an at-grade station (Stadium) and elevated stations in SODO, Delridge, Avalon, Alaska Junction, Ballard, Smith Cove, and Interbay and underground (tunnel) stations at Seattle Center and South Lake Union.

Preliminary engineering includes West Seattle Link and Ballard Link extensions. Upon completion of the environmental review and the environmental impact statement these projects will become stand-alone projects.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue alternatives development and evaluation; conduct feasibility studies on key project scope assumptions in the ST3 Plan, and begin stakeholders engagement.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$285,896
2020 TIP:	$285,896

Completion Schedule	
Baseline:	N/A
2019 :	2035
2020 :	2035

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$7,123,718
2019 Cost Estimate:	$7,093,909
2020 Cost Estimate:	$7,093,909

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$1,024	$994	$1,237	$1,300	$878	$0	$0	$0	$5,432
North King	50,070	48,588	60,478	63,544	42,919	0	0	0	265,597
South King	1,024	994	1,237	1,300	878	0	0	0	5,432
East King	1,078	1,046	1,302	1,368	924	0	0	0	5,718
Pierce	647	628	781	821	554	0	0	0	3,431
Systemwide	54	52	65	68	46	0	0	0	286
Total	$53,896	$52,301	$65,100	$68,400	$46,199	$0	$0	$0	$285,896

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$9,955	$7,800	$11,500	$13,700	$20,125	$0	$0	$0	$63,080
20-Prelim Engineering/Env Review	42,492	42,301	49,900	50,500	20,223	0	0	0	205,416
35-Third Party	806	1,450	2,700	2,700	3,744	0	0	0	11,400
40-Row Acquisition+Permits	644	750	1,000	1,500	2,106	0	0	0	6,000
Total	$53,896	$52,301	$65,100	$68,400	$46,199	$0	$0	$0	$285,896

Project Risk Assessment

There is risk to scope, schedule and budget when trying to reach stakeholder consensus on a preferred alternative, complexity of alignments in constrained environment with challenging topography and project deliverables that include two bridge crossings, constructing a tunnel through a mature urban environment and the effects in constrained environment. Potential impact on Central Link operations during construction; right of way and property impacts.

System Expansion LINK

400113 North Corridor MOW Managed by: PEPD

Design and construct a Maintenance of Way facility in Lynnwood. This building will facilitate as a report facility and support maintenance needs to Sound Transit assets to include facilities, vehicle maintenance, track, signals, communications, traction power and parts inventory north of the ship canal in Seattle. The proposed building could be temporary or permanent.

Changes to authorized project allocation since 2019: Established project at $491 thousand to begin Phase 1 of preliminary engineering.

Budget year activities: Analysis of intermediate and long-term maintenance of way (MOW) needs. Siting analysis for a MOW facility to support the north corridor.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$491

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$52	$439	$0	$0	$0	$0	$0	$0	$491
Total	$52	$439	$0	$0	$0	$0	$0	$0	$491

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
02-Operation+Maintenance-Agency	$52	$389	$0	$0	$0	$0	$0	$0	$441
40-Row Acquisition+Permits	0	50	0	0	0	0	0	0	50
Total	$52	$439	$0	$0	$0	$0	$0	$0	$491

Project Risk Assessment

Not having a Lynwood MOW facility would delay maintenance responses to the North Corridor segment. Severe impacts to revenue service would be realized as failed trains or systems would have to wait for maintainers to respond from the either the OMF Forest location or Bellevue OMFE using Interstate 5 through Seattle plagued with heavy traffic volumes. Furthermore, If regular scheduled maintenance activities performed during non-revenue hours could not be supported from this location, the driving time required to reach the Lynwood alignment would severely limit the time to perform them.

System Expansion LINK

400115 NE 130th Street Infill Station Managed by: PEPD

Plan, design and construct an elevated light rail station at 130th Street and I-5 in Seattle.

Changes to authorized project allocation since 2019: None.

Budget year activities: Pending board direction regarding strategy to advance the project. Board decision to advance to Final Design would result in an associated budget amendment.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$6,769
2020 TIP:	$6,769

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2036

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$76,094
2019 Cost Estimate:	$76,094
2020 Cost Estimate:	$75,670

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$3,888	$577	$2,304	$0	$0	$0	$0	$0	$6,769
Total	$3,888	$577	$2,304	$0	$0	$0	$0	$0	$6,769

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$616	$577	$177	$0	$0	$0	$0	$0	$1,370
20-Prelim Engineering/Env Review	2,998	0	1,191	0	0	0	0	0	4,189
35-Third Party	264	0	824	0	0	0	0	0	1,088
40-Row Acquisition+Permits	10	0	12	0	0	0	0	0	22
50-Construction	0	0	100	0	0	0	0	0	100
Total	$3,888	$577	$2,304	$0	$0	$0	$0	$0	$6,769

Project Risk Assessment

Timely completion of design work to allow concurrent construction with Lynnwood Link, or to eliminate/minimize operational impacts; Construction market conditions.

System Expansion — LINK

400117 — DSTT Single Tracking — Managed by: EXE

Develop and construct tunnel modifications supporting single tracking operations in the Downtown Seattle Transit Tunnel allowing the East Link project to establish a connection to active light rail service.

Changes to authorized project allocation since 2019: None.

Budget year activities: None.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$3,500
2020 TIP:	$3,500

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$21	$0	$0	$0	$0	$0	$0	$0	$21
East King	3,479	0	0	0	0	0	0	0	3,479
Total	$3,500	$0	$0	$0	$0	$0	$0	$0	$3,500

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$300	$0	$0	$0	$0	$0	$0	$0	$300
50-Construction	3,200	0	0	0	0	0	0	0	3,200
Total	$3,500	$0	$0	$0	$0	$0	$0	$0	$3,500

Project Risk Assessment

The risk exists that changing conditions or expectations could result in budget impacts to maintain a fixed schedule.

System Expansion — LINK

4X100 — Northgate Link Extension — Managed by: DECM

Plan, design, and construct a 4.3 mile extension of light rail from the University of Washington to Northgate via tunnel and elevated alignment. Stations will be located at University District, Roosevelt, and Northgate.

Changes to authorized project allocation since 2019: None.

Budget year activities: Substantial completion of all stations and systems contract work. Perform integrated testing in preparation for pre-revenue service operations.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$1,899,756
2019 TIP:	$1,899,756
2020 TIP:	$1,899,756

Completion Schedule	
Baseline:	2021
2019 :	2021
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$2,096,368
2019 Cost Estimate:	$2,260,380
2020 Cost Estimate:	$2,260,380

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,569,107	$126,148	$78,355	$22,737	$103,408	$0	$0	$0	$1,899,756
Total	$1,569,107	$126,148	$78,355	$22,737	$103,408	$0	$0	$0	$1,899,756

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$78,244	$11,192	$10,693	$9,225	$21,025	$0	$0	$0	$130,379
20-Prelim Engineering/Env Review	15,077	0	0	0	0	0	0	0	15,077
30-Final Design+Specifications	121,769	5,184	2,136	727	7,352	0	0	0	137,167
35-Third Party	7,405	1,442	1,402	863	688	0	0	0	11,800
40-Row Acquisition+Permits	101,040	300	41	200	10,720	0	0	0	112,300
50-Construction	1,155,307	90,323	48,559	7,576	32,827	0	0	0	1,334,593
55-Construction Services	89,265	9,440	8,233	2,774	8,598	0	0	0	118,310
80-System Testing+Startup	1,000	8,267	7,290	1,373	0	0	0	0	17,930
90-Contingency	0	0	0	0	22,200	0	0	0	22,200
Total	$1,569,107	$126,148	$78,355	$22,737	$103,408	$0	$0	$0	$1,899,756

Project Risk Assessment

Project risk is still a concern given multiple contract interfaces, the potential shortage of skilled labor and operations and maintenance support during startup and integration testing. Duration uncertainties for system installation, integration, and testing. Coordination with third parties (City of Seattle, WSDOT, UW etc.) which may result in unanticipated mitigation/restoration requests and/or delayed reviews. All of these potential issues could have an impact on schedule and budget.

System Expansion — LINK

4X115 — Lynnwood Link Extension — Managed by: DECM

Plan, design, and construct a 8.5 mile extension of light rail from Northgate to Lynnwood Transit Center via at-grade and elevated alignment. Stations will be located at Mountlake Terrace, Shoreline South/145th Street, Shoreline North/185th Street, and Lynnwood City Center.

Changes to authorized project allocation since 2019: None.

Budget year activities: Complete final design, and begin early construction activities with an expected notice to proceed during the third quarter. Continue right-of-way acquisition activities. Begin primary utility work and completie permitting activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$2,771,622
2019 TIP:	$2,771,622
2020 TIP:	$2,771,622

Completion Schedule	
Baseline:	2024
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$1,968,722
2019 Cost Estimate:	$1,677,740
2020 Cost Estimate:	$1,677,740

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$330,452	$275,567	$296,903	$297,466	$239,385	$68,827	$4,706	$0	$1,513,306
North King	274,772	229,135	246,875	247,343	199,049	57,229	3,913	0	1,258,316
Total	$605,224	$504,702	$543,778	$544,809	$438,434	$126,056	$8,619	$0	$2,771,622

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$36,175	$9,318	$11,495	$12,425	$22,663	$3,635	$2,453	$0	$98,164
20-Prelim Engineering/Env Review	39,053	0	0	0	0	0	1	0	39,054
30-Final Design+Specifications	115,416	10,426	9,304	8,237	14,085	2,652	4,042	0	164,162
35-Third Party	8,608	1,877	1,140	775	529	196	1,474	0	14,600
40-Row Acquisition+Permits	169,298	33,584	32,778	0	0	0	0	0	235,660
50-Construction	205,976	424,857	463,954	496,342	367,203	115,372	649	0	2,074,353
55-Construction Services	30,697	24,640	25,107	26,030	17,755	4,200	0	0	128,429
80-System Testing+Startup	0	0	0	1,000	16,200	0	0	0	17,200
Total	$605,224	$504,702	$543,778	$544,809	$438,434	$126,056	$8,619	$0	$2,771,622

Project Risk Assessment

There continues a project risk of obtaining permits from our local jurisdictions, WSDOT, and other resource agencies. The timely completion of right-of-way acquisition with limited staff resources, construction market conditions, and differing site conditions during construction could affect both schedule and budget.

System Expansion — LINK

4X199 — Northgate Link Extension Project Reserve — Managed by: DECM

Project reserve created for the Northgate Link Extension that, if required, can be directed to mitigate budget risks associated with project construction. Funding for the reserve originated from unused funds in the project reserve that was set up for the Initial Segment. The project reserve cannot be used for additional scope and its use requires super-majority approval by the Board.

Changes to authorized project allocation since 2019: None.

Budget year activities: None.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$50,000
2019 TIP:	$50,000
2020 TIP:	$50,000

Completion Schedule	
Baseline:	2021
2019 :	2021
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$0	$0	$0	$0	$50,000	$0	$0	$0	$50,000
Total	$0	$0	$0	$0	$50,000	$0	$0	$0	$50,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
90-Contingency	$0	$0	$0	$0	$50,000	$0	$0	$0	$50,000
Total	$0	$0	$0	$0	$50,000	$0	$0	$0	$50,000

Project Risk Assessment

This project reserve was established to mitigate potential project risks especially during tunnel activities. As the tunnel activity is substantially complete the risk is lower.

System Expansion — LINK

4X200 — University Link Extension — Managed by: DECM

Plan, design, and construct a 3.15 mile extension of light rail from Westlake Center to the University of Washington via tunnel. Stations will be located at Capitol Hill and the University of Washington.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue project closeout activities. Optimize and fine tune Link operating systems.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$1,756,007
2019 TIP:	$1,756,007
2020 TIP:	$1,756,007

Completion Schedule	
Baseline:	2016
2019 :	2016
2020 :	2016

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,514,981	$1,750	$2,276	$0	$0	$0	$0	$237,000	$1,756,007
Total	$1,514,981	$1,750	$2,276	$0	$0	$0	$0	$237,000	$1,756,007

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$84,473	$100	$500	$0	$0	$0	$0	$28,482	$113,554
20-Prelim Engineering/Env Review	24,261	0	0	0	0	0	0	0	24,261
30-Final Design+Specifications	86,833	150	250	0	0	0	0	3,075	90,308
35-Third Party	11,464	0	0	0	0	0	0	7,182	18,646
40-Row Acquisition+Permits	126,428	0	0	0	0	0	0	25,904	152,332
50-Construction	987,231	1,500	1,276	0	0	0	0	158,777	1,148,783
55-Construction Services	86,659	0	250	0	0	0	0	7,905	94,814
70-Vehicles	99,193	0	0	0	0	0	0	4,716	103,909
80-System Testing+Startup	8,440	0	0	0	0	0	0	960	9,400
Total	$1,514,981	$1,750	$2,276	$0	$0	$0	$0	$237,000	$1,756,007

Project Risk Assessment

N/A.

System Expansion — LINK

4X420 — South 200th Link Extension — Managed by: DECM

Plan, design, and construct a 1.6 mile extension of light rail from the Sea-Tac Airport to South 200th Street in SeaTac via an elevated alignment. There will be one station at South 200th Street.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$383,241
2019 TIP:	$383,241
2020 TIP:	$383,241

Completion Schedule	
Baseline:	2016
2019 :	2016
2020 :	2016

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$462,351
2019 Cost Estimate:	$471,560
2020 Cost Estimate:	$471,560

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$329,402	$146	$0	$0	$0	$0	$0	$53,693	$383,241
Total	$329,402	$146	$0	$0	$0	$0	$0	$53,693	$383,241

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$16,428	$61	$0	$0	$0	$0	$0	$653	$17,142
20-Prelim Engineering/Env Review	5,698	0	0	0	0	0	0	0	5,698
30-Final Design+Specifications	8,783	20	0	0	0	0	0	721	9,523
35-Third Party	3,812	0	0	0	0	0	0	3,073	6,885
40-Row Acquisition+Permits	38,052	0	0	0	0	0	0	5,497	43,549
50-Construction	237,962	50	0	0	0	0	0	43,010	281,022
55-Construction Services	17,304	15	0	0	0	0	0	203	17,522
80-System Testing+Startup	1,363	0	0	0	0	0	0	537	1,900
Total	$329,402	$146	$0	$0	$0	$0	$0	$53,693	$383,241

Project Risk Assessment

N/A.

System Expansion — LINK

4X445 — Federal Way Link Extension — Managed by: DECM

Plan, design, and construct a 7.8 mile extension of light rail from South 200th Street in SeaTac to Federal Way Transit Center. Stations will be located at Kent-Des Moines Road in Kent, South 272nd Street in Federal Way, and the Federal Way Transit Center.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue right-of-way acquisition activities and utility relocation work by others; continue design and begin major construction work on design-build construction contract; continue third party coordination activities with all Authorities Having Jurisdiction (AHJ).

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$2,451,535
2019 TIP:	$2,451,535
2020 TIP:	$2,451,535

Completion Schedule	
Baseline:	2024
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$1,254,390
2019 Cost Estimate:	$1,779,470
2020 Cost Estimate:	$1,779,470

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$364,409	$313,935	$334,008	$310,809	$329,010	$408,966	$171,245	$219,153	$2,451,535
Total	$364,409	$313,935	$334,008	$310,809	$329,010	$408,966	$171,245	$219,153	$2,451,535

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$20,684	$7,307	$10,445	$10,916	$13,766	$13,082	$8,517	$11,803	$96,520
20-Prelim Engineering/Env Review	45,279	250	400	300	924	1,798	0	0	48,951
30-Final Design+Specifications	937	208	1,242	175	414	109	0	0	3,085
35-Third Party	5,531	2,201	4,114	4,626	4,331	2,240	4,439	258	27,741
40-Row Acquisition+Permits	129,376	90,089	25,631	4,982	4,982	80,941	2,782	0	338,783
50-Construction	152,245	198,210	275,405	272,538	278,651	295,400	128,703	207,092	1,808,244
55-Construction Services	10,356	15,671	16,771	17,272	15,463	4,669	26,804	0	107,006
80-System Testing+Startup	0	0	0	0	10,479	10,726	0	0	21,205
Total	$364,409	$313,935	$334,008	$310,809	$329,010	$408,966	$171,245	$219,153	$2,451,535

Project Risk Assessment

Risk to this project includes reaching agreement on Midway landfill with WSDOT and SPU, encountering unknown contaminated materials and utilities, and securing remaining right-of-way for acquisition and relocations.

System Expansion — LINK

4X600 — East Link Extension — Managed by: DECM

Plan, design, and construct a 14 mile extension of light rail from the International District in downtown Seattle to the Overlake area of Redmond via at-grade, tunnel, and elevated alignments. Stations will be located at Judkins Park, Mercer Island, South Bellevue, East Main in Bellevue, downtown Bellevue, Wilburton, the Spring District/120th St, Bel-Red/130th Street, Overlake Village, and Redmond Technology Center.

Changes to authorized project allocation since 2019: None.

Budget year activities: Reaching substantial completion on all segments except E335 and systems. System works continues. Some start up activities to support OMF East.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$3,677,150
2019 TIP:	$3,677,150
2020 TIP:	$3,677,150

Completion Schedule	
Baseline:	2023
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$4,019,793
2019 Cost Estimate:	$3,699,287
2020 Cost Estimate:	$3,699,287

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$14,058	$3,636	$1,489	$853	$786	$876	$158	$206	$22,063
East King	2,329,011	602,348	246,752	141,242	130,234	145,204	26,251	34,046	3,655,087
Total	$2,343,070	$605,984	$248,241	$142,094	$131,020	$146,080	$26,410	$34,251	$3,677,150

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$89,946	$14,920	$17,160	$17,806	$19,446	$18,383	$8,540	$0	$186,200
20-Prelim Engineering/Env Review	54,776	0	0	0	0	3	80	1,040	55,900
30-Final Design+Specifications	223,691	13,355	11,699	7,673	6,517	6,262	10,088	3,715	283,000
35-Third Party	29,015	5,291	5,155	4,334	2,768	4,400	0	1,187	52,150
40-Row Acquisition+Permits	270,776	2,650	550	683	0	23,491	0	0	298,150
50-Construction	1,554,403	530,868	194,577	91,981	85,939	69,382	1,012	16,138	2,544,300
55-Construction Services	120,462	38,900	19,100	19,618	16,351	24,159	6,690	12,171	257,450
Total	$2,343,070	$605,984	$248,241	$142,094	$131,020	$146,080	$26,410	$34,251	$3,677,150

Project Risk Assessment

The risks to this large project include; multiple contract interfaces, inflationary pressure on both materials and labor (due to shortages), the coordination with third parties (City of Seattle, WSDOT, MI and Redmond) which could have impacts on both schedule and budget.

System Expansion | LINK

4X630 | **Downtown Redmond Link Extension** | **Managed by: DECM**

Plan, design, and construct a 3.7 mile light rail extension from Overlake Transit Center to downtown Redmond. Stations will be located at southeast Redmond and downtown Redmond.

Changes to authorized project allocation since 2019: None.

Budget year activities: Commence right of way acquisitions, complete design and develop agreements with City of Redmond, Washington Department of Transportation (WSDOT) and King County. Review and evaluate response to the Request for Proposal (RFP) and award a design-build contract.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$1,530,000
2019 TIP:	$1,530,000
2020 TIP:	$1,530,000

Completion Schedule	
Baseline:	2024
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$1,242,278
2019 Cost Estimate:	$1,266,816
2020 Cost Estimate:	$1,266,816

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
East King	$120,743	$149,607	$254,915	$322,475	$307,764	$119,744	$125,812	$128,939	$1,530,000
Total	$120,743	$149,607	$254,915	$322,475	$307,764	$119,744	$125,812	$128,939	$1,530,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$8,112	$5,000	$12,299	$13,665	$12,731	$11,458	$8,381	$5,354	$77,000
20-Prelim Engineering/Env Review	18,519	500	514	0	0	0	261	3,206	23,000
30-Final Design+Specifications	145	175	1,253	1,088	654	120	0	1,065	4,500
35-Third Party	2,804	2,005	2,800	3,130	1,464	763	1,864	2,170	17,000
40-Row Acquisition+Permits	66,405	26,371	18,670	7,500	2,750	750	250	76,304	199,000
50-Construction	21,600	108,356	209,629	283,842	270,165	86,384	110,150	40,351	1,130,477
55-Construction Services	3,158	7,200	9,500	12,250	14,750	12,269	4,000	489	63,616
80-System Testing+Startup	0	0	250	1,000	5,250	8,000	907	0	15,407
Total	$120,743	$149,607	$254,915	$322,475	$307,764	$119,744	$125,812	$128,939	$1,530,000

Project Risk Assessment

Budget and schedule risk is a concern as marketplace inflationary pressure on property acquisitions and construction pricing may increase resulting in a budget adjustments.

2020 Cashflow by Budget Approval

(in thousands)

System Expansion

SOUNDER

Project Number and Name		Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Preliminary Engineering										
300019	Lakewood Station Improvements	$292	$811	$152	$0	$0	$0	$0	$0	$1,255
300035	Kent Station Parking and Access Improvements	3,867	7,304	4,440	0	0	0	0	0	15,611
300040	Auburn Station Parking and Access Improvements	4,032	5,335	2,074	0	0	0	0	0	11,441
300087	Edmonds and Mukilteo Stations Parking & Access Improvements	938	1,161	412	0	0	0	0	0	2,511
	Subtotal	9,128	14,611	7,078	0	0	0	0	0	30,818
Final Design & ROW										
300004	Sounder Maintenance Base	8,413	2,982	1,573	0	0	0	0	0	12,968
300018	Sumner Station Parking and Access Improvements	9,495	7,686	601	0	0	0	0	0	17,782
3X510	Sounder South Expanded Service	200,843	75	0	0	0	0	0	4,650	205,568
	Subtotal	218,751	10,743	2,174	0	0	0	0	4,650	236,318
Baseline										
300017	Puyallup Station Parking and Access Improvements	10,560	24,375	37,813	2,603	3,749	0	0	0	79,100
300021	Tacoma Trestle Track & Signal	125,021	258	0	0	0	0	0	35,738	161,017
300026	Sounder Yard Expansion	16,305	55	0	0	0	0	0	4,190	20,550
300027	Point Defiance Bypass	75,212	50	0	0	0	0	0	8,408	83,670
3X135	D St-M St Track & Signal	152,903	30	0	0	0	0	0	5,328	158,262
3X206	Mukilteo Station, S Platform	17,294	379	0	0	0	0	640	0	18,313
3X236	Tukwila Station	38,889	50	0	0	0	0	0	7,030	45,969
	Subtotal	436,184	25,197	37,813	2,603	3,749	0	640	60,695	566,881
Program										
300056	South Sounder Capacity Expansion	2,073	1,159	362	0	0	0	0	0	3,594
7X755	Sounder Fleet Expansion	52,100	5,236	2,631	7,234	0	0	0	0	67,200
	Subtotal	54,173	6,395	2,993	7,234	0	0	0	0	70,794
	Total	$718,236	$56,946	$50,058	$9,837	$3,749	$0	$640	$65,344	$904,811

2020 Cashflow by Subarea

(in thousands)

System Expansion

SOUNDER

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
1 - Snohomish	$19,494	$1,988	$648	$0	$0	$0	$640	$0	$22,769
3 - South King	56,292	13,237	6,676	0	0	0	0	9,234	85,439
5 - Pierce	642,451	41,722	42,734	9,837	3,749	0	0	56,110	796,603
Total	$718,236	$56,946	$50,058	$9,837	$3,749	$0	$640	$65,344	$904,811

2020 Cashflow by Phase

(in thousands)

Phase # and Description	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$32,611	$4,681	$1,821	$104	$224	$0	$81	$4,357	$43,879
20-Prelim Engineering/Env Review	23,534	2,751	2,136	0	221	0	0	496	29,139
30-Final Design+Specifications	36,404	310	223	0	8	0	135	5,249	42,329
35-Third Party	2,955	7,213	605	0	30	0	1	3,599	14,403
40-Row Acquisition+Permits	257,355	9,194	4,356	0	268	0	58	7,331	278,562
50-Construction	279,675	21,458	34,723	1,677	2,887	0	239	37,990	378,650
55-Construction Services	23,633	6,103	3,563	822	111	0	125	6,323	40,681
70-Vehicles	61,023	5,236	2,631	7,234	0	0	0	0	76,124
80-System Testing+Startup	1,046	0	0	0	0	0	0	0	1,046
Total	$718,236	$56,946	$50,058	$9,837	$3,749	$0	$640	$65,344	$904,811

System Expansion — SOUNDER

300004 — Sounder Maintenance Base — Managed by: DECM

Plan, design, and construct a heavy rail storage and maintenance facility in support of agency rail operations.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue baseline activities, advanced utility relocations, and right of way acquisition activities. Begin final design and construction through the design-build contract.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$12,968
2020 TIP:	$12,968

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$217,193
2019 Cost Estimate:	$190,875
2020 Cost Estimate:	$190,875

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$1,262	$447	$236	$0	$0	$0	$0	$0	$1,945
Pierce	7,151	2,535	1,337	0	0	0	0	0	11,023
Total	$8,413	$2,982	$1,573	$0	$0	$0	$0	$0	$12,968

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2,109	$327	$75	$0	$0	$0	$0	$0	$2,511
20-Prelim Engineering/Env Review	2,598	100	767	0	0	0	0	0	3,465
40-Row Acquisition+Permits	2,356	635	1	0	0	0	0	0	2,992
50-Construction	500	1,250	250	0	0	0	0	0	2,000
55-Construction Services	850	670	480	0	0	0	0	0	2,000
Total	$8,413	$2,982	$1,573	$0	$0	$0	$0	$0	$12,968

Project Risk Assessment

There is a high risk that advanced utility relocation, potential differing site conditions, and the inability to deliver timely property acquisition and relocations could impact both the schedule and budget.

System Expansion — SOUNDER

300017 — Puyallup Station Parking and Access Improvements — Managed by: DECM

Plan, design, and construct a parking garage and access improvements to the existing Puyallup Sounder Station for bicyclists, bus riders, and drivers.

Changes to authorized project allocation since 2019: None.

Budget year activities: Complete right-of-way acquisition activities. Design-build contractor will start final design and begin construction. Design-build/project management will be on board supporting the contractor.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$79,100
2019 TIP:	$79,100
2020 TIP:	$79,100

Completion Schedule	
Baseline:	2022
2019 :	2022
2020 :	2022

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$84,810
2019 Cost Estimate:	$71,688
2020 Cost Estimate:	$71,688

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$10,560	$24,375	$37,813	$2,603	$3,749	$0	$0	$0	$79,100
Total	$10,560	$24,375	$37,813	$2,603	$3,749	$0	$0	$0	$79,100

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,849	$1,307	$1,131	$104	$224	$0	$0	$0	$4,614
20-Prelim Engineering/Env Review	2,567	100	0	0	221	0	0	0	2,888
30-Final Design+Specifications	144	10	13	0	8	0	0	0	175
35-Third Party	60	50	190	0	30	0	0	0	330
40-Row Acquisition+Permits	4,376	992	0	0	268	0	0	0	5,636
50-Construction	1,415	19,866	34,441	1,677	2,887	0	0	0	60,286
55-Construction Services	150	2,050	2,038	822	111	0	0	0	5,171
Total	$10,560	$24,375	$37,813	$2,603	$3,749	$0	$0	$0	$79,100

Project Risk Assessment

There is risk to budget and schedule, if the project can not achieve timely property acquisitions and coordination with jurisdictions and utilities.

System Expansion SOUNDER

300018 Sumner Station Parking and Access Improvements Managed by: DECM

Plan, design, and construct a parking garage and access improvements to the existing Sumner Sounder Station for bicyclists, bus riders, and drivers.

Changes to authorized project allocation since 2019: None.

Budget year activities: Complete design-build bridging documents and right-of-way acquisition activities. Continue the Request for Proposal (RFP) process for the design-build and design-build/project management contracts.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$17,782
2020 TIP:	$17,782

Completion Schedule	
Baseline:	N/A
2019 :	2021
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$59,450
2019 Cost Estimate:	$54,845
2020 Cost Estimate:	$54,845

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$9,495	$7,686	$601	$0	$0	$0	$0	$0	$17,782
Total	$9,495	$7,686	$601	$0	$0	$0	$0	$0	$17,782

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,448	$514	$211	$0	$0	$0	$0	$0	$2,173
20-Prelim Engineering/Env Review	2,521	170	305	0	0	0	0	0	2,996
35-Third Party	1,546	6,088	8	0	0	0	0	0	7,642
40-Row Acquisition+Permits	3,883	531	0	0	0	0	0	0	4,414
50-Construction	97	0	32	0	0	0	0	0	129
55-Construction Services	0	383	45	0	0	0	0	0	428
Total	$9,495	$7,686	$601	$0	$0	$0	$0	$0	$17,782

Project Risk Assessment

There is a risk to budget and schedule, if the project can not achieve timely property acquisition and coordination with jurisdictions.

System Expansion SOUNDER

300019 Lakewood Station Improvements Managed by: PEPD

Plan, design, and construct a parking garage and access improvements to the existing Lakewood Sounder Station for bicyclists, bus riders, and drivers.

Changes to authorized project allocation since 2019: Increased by $851 thousand in support of project activities for alternatives analysis and right of way.

Budget year activities: Commence alternative analysis.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$404
2020 TIP:	$1,255

Completion Schedule	
Baseline:	N/A
2019 :	2016
2020 :	2025

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$51,917
2019 Cost Estimate:	$44,199
2020 Cost Estimate:	$44,199

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$292	$811	$152	$0	$0	$0	$0	$0	$1,255
Total	$292	$811	$152	$0	$0	$0	$0	$0	$1,255

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$40	$240	$12	$0	$0	$0	$0	$0	$292
20-Prelim Engineering/Env Review	0	570	29	0	0	0	0	0	599
35-Third Party	252	0	112	0	0	0	0	0	363
40-Row Acquisition+Permits	0	1	0	0	0	0	0	0	1
Total	$292	$811	$152	$0	$0	$0	$0	$0	$1,255

Project Risk Assessment

N/A.

System Expansion SOUNDER

300021 **Tacoma Trestle Track & Signal** **Managed by: DECM**

Plan, design, and construct a double-track replacement of the Tacoma Trestle between the Tacoma Dome and M Street in Tacoma. Funds budgeted beyond 2019 are considered surplus.

Changes to authorized project allocation since 2019: None.

Budget year activities: Finalize follow-on work and continue project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$161,017
2019 TIP:	$161,017
2020 TIP:	$161,017

Completion Schedule	
Baseline:	2018
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$92,061
2019 Cost Estimate:	$175,538
2020 Cost Estimate:	$175,538

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$125,021	$258	$0	$0	$0	$0	$0	$35,738	$161,017
Total	$125,021	$258	$0	$0	$0	$0	$0	$35,738	$161,017

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$5,606	$145	$0	$0	$0	$0	$0	$2,343	$8,094
20-Prelim Engineering/Env Review	4,062	0	0	0	0	0	0	0	4,062
30-Final Design+Specifications	11,185	100	0	0	0	0	0	3,913	15,198
35-Third Party	340	0	0	0	0	0	0	1,442	1,781
40-Row Acquisition+Permits	6,697	0	0	0	0	0	0	3,364	10,061
50-Construction	91,189	13	0	0	0	0	0	23,038	114,240
55-Construction Services	5,942	0	0	0	0	0	0	1,639	7,581
Total	$125,021	$258	$0	$0	$0	$0	$0	$35,738	$161,017

Project Risk Assessment

The risk of a construction claim is high.

System Expansion SOUNDER

300026 **Sounder Yard Expansion** **Managed by: DECM**

Plan, design, and construct a heavy rail layover yard to increase storage capacity in Lakewood in support of increased passenger service.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$20,550
2019 TIP:	$20,550
2020 TIP:	$20,550

Completion Schedule	
Baseline:	2014
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	$24,571
2020 Cost Estimate:	$24,571

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$8,576	$29	$0	$0	$0	$0	$0	$2,204	$10,809
Pierce	7,728	26	0	0	0	0	0	1,986	9,741
Total	$16,305	$55	$0	$0	$0	$0	$0	$4,190	$20,550

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,372	$55	$0	$0	$0	$0	$0	$98	$1,525
20-Prelim Engineering/Env Review	1,208	0	0	0	0	0	0	496	1,704
40-Row Acquisition+Permits	182	0	0	0	0	0	0	218	400
50-Construction	12,333	0	0	0	0	0	0	3,188	15,521
55-Construction Services	1,210	0	0	0	0	0	0	190	1,400
Total	$16,305	$55	$0	$0	$0	$0	$0	$4,190	$20,550

Project Risk Assessment

N/A

System Expansion SOUNDER

300027 **Point Defiance Bypass** **Managed by: DECM**

Under the direction of WSDOT, install signal and safety improvements and construct a new second track adjacent to the existing rail line between South Tacoma and Lakewood. Additionally, install track and signal improvements at BNSF's main line connection near Nisqually.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$83,670
2019 TIP:	$83,670
2020 TIP:	$83,670

Completion Schedule	
Baseline:	2015
2019 :	2017
2020 :	2017

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$75,212	$50	$0	$0	$0	$0	$0	$8,408	$83,670
Total	$75,212	$50	$0	$0	$0	$0	$0	$8,408	$83,670

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2,804	$50	$0	$0	$0	$0	$0	$347	$3,201
30-Final Design+Specifications	103	0	0	0	0	0	0	97	200
40-Row Acquisition+Permits	52	0	0	0	0	0	0	348	400
50-Construction	65,360	0	0	0	0	0	0	4,263	69,623
55-Construction Services	6,894	0	0	0	0	0	0	3,352	10,246
Total	$75,212	$50	$0	$0	$0	$0	$0	$8,408	$83,670

Project Risk Assessment

N/A.

System Expansion SOUNDER

300035 **Kent Station Parking and Access Improvements** **Managed by: PEPD**

Plan, design, and construct a parking garage and access improvements to the existing Kent Sounder Station for bicyclists, bus riders, and drivers.

Changes to authorized project allocation since 2019: Increased by $2.5 million in support of engineering/construction services and design review services.

Budget year activities: Start design-build bridging documents, start the Request for Proposal (RFP) process for the design-build contracts, and right of way activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$13,111
2020 TIP:	$15,611

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$43,166
2019 Cost Estimate:	$71,412
2020 Cost Estimate:	$71,412

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$3,867	$7,304	$4,440	$0	$0	$0	$0	$0	$15,611
Total	$3,867	$7,304	$4,440	$0	$0	$0	$0	$0	$15,611

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,070	$539	$101	$0	$0	$0	$0	$0	$1,710
20-Prelim Engineering/Env Review	2,784	300	325	0	0	0	0	0	3,409
35-Third Party	0	500	105	0	0	0	0	0	605
40-Row Acquisition+Permits	13	4,465	3,409	0	0	0	0	0	7,887
55-Construction Services	0	1,500	500	0	0	0	0	0	2,000
Total	$3,867	$7,304	$4,440	$0	$0	$0	$0	$0	$15,611

Project Risk Assessment

Inability to reach concurrence with the City on permitting requirements and other local codes that may impact project budget and schedule.

System Expansion | SOUNDER

300040 | Auburn Station Parking and Access Improvements | Managed by: PEPD

Plan, design, and construct a parking garage and access improvements to the existing Auburn Sounder Station for bicyclists, bus riders, and drivers.

Changes to authorized project allocation since 2019: Increased by $2.5 million in support of engineering/construction services and third party agreements.

Budget year activities: Start design-build bridging documents, start the Request for Proposal (RFP) process for the design-build contracts, and right of way activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$8,941
2020 TIP:	$11,441

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$45,041
2019 Cost Estimate:	$65,819
2020 Cost Estimate:	$65,819

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$4,032	$5,335	$2,074	$0	$0	$0	$0	$0	$11,441
Total	$4,032	$5,335	$2,074	$0	$0	$0	$0	$0	$11,441

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,053	$502	$84	$0	$0	$0	$0	$0	$1,639
20-Prelim Engineering/Env Review	2,611	300	498	0	0	0	0	0	3,409
35-Third Party	15	545	45	0	0	0	0	0	605
40-Row Acquisition+Permits	353	2,488	947	0	0	0	0	0	3,788
55-Construction Services	0	1,500	500	0	0	0	0	0	2,000
Total	$4,032	$5,335	$2,074	$0	$0	$0	$0	$0	$11,441

Project Risk Assessment

Inability to reach concurrence with the City on permitting requirements and other local codes that may impact project budget and schedule.

System Expansion | SOUNDER

300056 | South Sounder Capacity Expansion | Managed by: PEPD

Plan, design, and establish a capital program to improve South Sounder access, capacity, and services in response to increase in demand.

Program elements could include platform extensions, track and signal upgrades and other related infrastructure to facilitate additional capacity, and access elements such as improvements for pedestrians, bicyclists, buses, and private vehicles, prioritized per Sound Transit's System Access Policy.

Changes to authorized project allocation since 2019: Increased by $998 thousand in support of engineering activities and BNSF coordination.

Budget year activities: Complete the Sounder Strategic Development & Implementation Plan and BNSF coordination.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$2,596
2020 TIP:	$3,594

Completion Schedule	
Baseline:	N/A
2019 :	2036
2020 :	2036

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$1,139,593
2019 Cost Estimate:	$1,137,864
2020 Cost Estimate:	$1,137,864

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$928	$519	$162	$0	$0	$0	$0	$0	$1,608
Pierce	1,145	640	200	0	0	0	0	0	1,986
Total	$2,073	$1,159	$362	$0	$0	$0	$0	$0	$3,594

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$731	$366	$55	$0	$0	$0	$0	$0	$1,152
20-Prelim Engineering/Env Review	1,342	593	97	0	0	0	0	0	2,032
30-Final Design+Specifications	0	200	210	0	0	0	0	0	410
Total	$2,073	$1,159	$362	$0	$0	$0	$0	$0	$3,594

Project Risk Assessment

The completion of the strategic plan may identify risks that could effect the scope, schedule, and budget. Concurrence with other jurisdictions cannot be reached.

System Expansion — SOUNDER

300087 — Edmonds and Mukilteo Stations Parking & Access Improvements — Managed by: PEPD

Plan, design, and construct system access improvements at the Mukilteo and Edmonds Sounder stations.

Changes to project allocation since 2019: None.

Budget year activities: Finish Phase 1 of preliminary engineering. Advance Phase 2 of the feasibility study to analyze subset of projects.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$2,511
2020 TIP:	$2,511

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$48,398
2019 Cost Estimate:	$48,194
2020 Cost Estimate:	$48,194

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$938	$1,161	$412	$0	$0	$0	$0	$0	$2,511
Total	$938	$1,161	$412	$0	$0	$0	$0	$0	$2,511

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$398	$431	$153	$0	$0	$0	$0	$0	$982
20-Prelim Engineering/Env Review	530	618	114	0	0	0	0	0	1,262
35-Third Party	10	30	145	0	0	0	0	0	185
40-Row Acquisition+Permits	0	82	0	0	0	0	0	0	82
Total	$938	$1,161	$412	$0	$0	$0	$0	$0	$2,511

Project Risk Assessment

Challenge in equitably allocating project budget between 2 stations area. Cities and stakeholders desires for more parking than appear affordable.

System Expansion — SOUNDER

3X135 — D St-M St Track & Signal — Managed by: DECM

Plan, design, and construct a 1.4 mile rail connection between Tacoma Dome Station and Lakewood.

Changes to authorized project allocation since 2019: None.

Budget year activities: Finalize improvements and follow-on work with local jurisdiction, and complete closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$161,581
2019 TIP:	$158,262
2020 TIP:	$158,262

Completion Schedule	
Baseline:	2012
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$161,581
2019 Cost Estimate:	$158,262
2020 Cost Estimate:	$158,262

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$152,903	$30	$0	$0	$0	$0	$0	$5,328	$158,262
Total	$152,903	$30	$0	$0	$0	$0	$0	$5,328	$158,262

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$8,961	$30	$0	$0	$0	$0	$0	$615	$9,606
20-Prelim Engineering/Env Review	1,733	0	0	0	0	0	0	0	1,733
30-Final Design+Specifications	17,308	0	0	0	0	0	0	804	18,112
35-Third Party	605	0	0	0	0	0	0	241	846
40-Row Acquisition+Permits	42,144	0	0	0	0	0	0	1,485	43,629
50-Construction	66,980	0	0	0	0	0	0	1,583	68,563
55-Construction Services	5,173	0	0	0	0	0	0	600	5,773
70-Vehicles	8,953	0	0	0	0	0	0	0	8,953
80-System Testing+Startup	1,046	0	0	0	0	0	0	0	1,046
Total	$152,903	$30	$0	$0	$0	$0	$0	$5,328	$158,262

Project Risk Assessment

N/A.

System Expansion SOUNDER

3X206 **Mukilteo Station, S Platform** **Managed by: DECM**

Construct the south platform and install stairs, elevators, and a pedestrian bridge in support of Sounder operations at Mukilteo Station.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue follow-on work and project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$18,313
2019 TIP:	$18,313
2020 TIP:	$18,313

Completion Schedule	
Baseline:	2019
2019 :	2019
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$15,511
2019 Cost Estimate:	$12,602
2020 Cost Estimate:	$12,602

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$17,294	$379	$0	$0	$0	$0	$640	$0	$18,313
Total	$17,294	$379	$0	$0	$0	$0	$640	$0	$18,313

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,721	$75	$0	$0	$0	$0	$81	$0	$1,877
30-Final Design+Specifications	2,274	0	0	0	0	0	135	0	2,409
35-Third Party	34	0	0	0	0	0	1	0	35
40-Row Acquisition+Permits	1,720	0	0	0	0	0	58	0	1,778
50-Construction	9,820	304	0	0	0	0	239	0	10,363
55-Construction Services	1,725	0	0	0	0	0	125	0	1,850
Total	$17,294	$379	$0	$0	$0	$0	$640	$0	$18,313

Project Risk Assessment

N/A.

System Expansion SOUNDER

3X236 **Tukwila Station** **Managed by: DECM**

Design and construct a commuter rail station and access improvements, replacing the temporary Tukwila Sounder Station. Currently on track to closeout by end of October, 2019.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project close out activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$45,969
2019 TIP:	$45,969
2020 TIP:	$45,969

Completion Schedule	
Baseline:	2010
2019 :	2010
2020 :	2010

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$45,258
2019 Cost Estimate:	$57,714
2020 Cost Estimate:	$57,714

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$38,889	$50	$0	$0	$0	$0	$0	$7,030	$45,969
Total	$38,889	$50	$0	$0	$0	$0	$0	$7,030	$45,969

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,931	$50	$0	$0	$0	$0	$0	$792	$2,773
20-Prelim Engineering/Env Review	1,101	0	0	0	0	0	0	0	1,101
30-Final Design+Specifications	4,600	0	0	0	0	0	0	324	4,924
40-Row Acquisition+Permits	10,387	0	0	0	0	0	0	622	11,009
50-Construction	19,182	0	0	0	0	0	0	4,899	24,081
55-Construction Services	1,689	0	0	0	0	0	0	392	2,081
Total	$38,889	$50	$0	$0	$0	$0	$0	$7,030	$45,969

Project Risk Assessment

N/A.

System Expansion SOUNDER

3X510 Sounder South Expanded Service Managed by: DECM

Purchase four additional commuter rail easements between Seattle and Lakewood from Burlington Northern Santa Fe (BNSF) Railroad and ensure compliance with federal and state environmental and mitigation requirements.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$205,568
2020 TIP:	$205,568

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$298,229
2019 Cost Estimate:	$379,163
2020 Cost Estimate:	$379,163

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$200,843	$75	$0	$0	$0	$0	$0	$4,650	$205,568
Total	$200,843	$75	$0	$0	$0	$0	$0	$4,650	$205,568

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,488	$50	$0	$0	$0	$0	$0	$161	$1,700
20-Prelim Engineering/Env Review	479	0	0	0	0	0	0	0	479
30-Final Design+Specifications	790	0	0	0	0	0	0	110	900
35-Third Party	93	0	0	0	0	0	0	1,917	2,010
40-Row Acquisition+Permits	185,192	0	0	0	0	0	0	1,293	186,485
50-Construction	12,800	25	0	0	0	0	0	1,019	13,844
55-Construction Services	0	0	0	0	0	0	0	150	150
Total	$200,843	$75	$0	$0	$0	$0	$0	$4,650	$205,568

Project Risk Assessment

N/A.

System Expansion SOUNDER

7X755 Sounder Fleet Expansion Managed by: Operations

Procure, accept and test locomotives, coaches, and cab cars to support additional trips between Seattle and Lakewood stations.

Changes to authorized project allocation since 2019: None.

Budget year activities: Procurement of three new cab cars.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$67,200
2020 TIP:	$67,200

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2022

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$41,314
2019 Cost Estimate:	$51,704
2020 Cost Estimate:	$51,704

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$52,100	$5,236	$2,631	$7,234	$0	$0	$0	$0	$67,200
Total	$52,100	$5,236	$2,631	$7,234	$0	$0	$0	$0	$67,200

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$29	$0	$0	$0	$0	$0	$0	$0	$29
70-Vehicles	52,070	5,236	2,631	7,234	0	0	0	0	67,171
Total	$52,100	$5,236	$2,631	$7,234	$0	$0	$0	$0	$67,200

Project Risk Assessment

Procurement of locomotive is dependent on a qualified locomotive being available as well as the cab cars. The low number of cab cars requires a collective of several small orders to generate a large enough order to make the procurement cost effective for both the manufacturer and the agency. As such, the anticipated schedule for procurement must address several variables to be successful.

2020 Cashflow by Budget Approval

(in thousands)

System Expansion

REGIONAL EXPRESS

Project Number and Name		Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Preliminary Engineering										
500005	Bus Base South	$1,205	$600	$2,685	$1,318	$0	$0	$0	$0	$5,808
500030	Bothell Transit Related Improvements	7	0	1,010	4,023	0	0	0	0	5,040
500086	Bus on Shoulder	867	1,495	1,504	12	0	0	0	0	3,878
500110	RapidRide C and D	661	5,495	15,020	17,395	17,245	9,184	0	0	65,000
500111	Pacific Ave SR 7 Bus Rapid Transit	2,542	10,590	24,165	21,665	1,538	0	0	0	60,500
500117	North Sammamish Park-and-Ride	248	765	1,052	0	0	0	0	0	2,065
	Subtotal	5,529	18,945	45,436	44,413	18,783	9,184	0	0	142,291
Baseline										
5X387	I-90 Two-Way Transit & HOV Operations, Stage 3	198,405	1,570	3,771	2,555	2,555	285	0	16,508	225,648
	Subtotal	198,405	1,570	3,771	2,555	2,555	285	0	16,508	225,648
Program										
700720	ST Express Fleet Expansion	23,940	22,817	0	0	0	0	0	0	46,757
	Subtotal	23,940	22,817	0	0	0	0	0	0	46,757
	Total	$227,874	$43,332	$49,207	$46,968	$21,338	$9,469	$0	$16,508	$414,696

2020 Cashflow by Subarea

(in thousands)

System Expansion

REGIONAL EXPRESS

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
1 - Snohomish	$3,506	$3,472	$996	$240	$0	$0	$0	$0	$8,214
2 - North King	661	5,495	15,020	17,395	17,245	9,184	0	0	65,000
3 - South King	3,047	3,069	827	157	0	0	0	0	7,100
4 - East King	216,552	19,133	7,081	7,191	2,555	285	0	16,508	269,306
5 - Pierce	4,109	12,162	25,282	21,985	1,538	0	0	0	65,075
Total	$227,874	$43,332	$49,207	$46,968	$21,338	$9,469	$0	$16,508	$414,696

2020 Cashflow by Phase

(in thousands)

Phase # and Description	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$3,399	$740	$911	$641	$238	$219	$0	$839	$6,988
20-Prelim Engineering/Env Review	3,054	1,670	3,582	1,305	100	0	0	0	9,712
30-Final Design+Specifications	18,451	1,100	1,000	0	0	0	0	3,570	24,121
35-Third Party	2,862	15,520	39,650	42,500	18,500	9,000	0	0	128,032
40-Row Acquisition+Permits	3	15	248	10	0	0	0	0	276
50-Construction	176,164	1,470	3,816	2,512	2,500	250	0	12,099	198,810
70-Vehicles	23,940	22,817	0	0	0	0	0	0	46,757
Total	$227,874	$43,332	$49,207	$46,968	$21,338	$9,469	$0	$16,508	$414,696

System Expansion

REGIONAL EXPRESS

500005 **Bus Base South** **Managed by: PEPD**

Plan, design, and construct a bus base for operating and maintaining the ST Express bus fleet.

Changes to authorized project allocation since 2019: None.

Budget year activities: Resume conceptual engineering and environmental documentation upon direction of the Board.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$5,808
2020 TIP:	$5,808

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$242,876
2019 Cost Estimate:	$234,657
2020 Cost Estimate:	$234,657

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$216	$107	$481	$236	$0	$0	$0	$0	$1,040
South King	140	70	311	153	0	0	0	0	674
East King	560	279	1,248	613	0	0	0	0	2,701
Pierce	289	144	644	316	0	0	0	0	1,394
Total	$1,205	$600	$2,685	$1,318	$0	$0	$0	$0	$5,808

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$404	$100	$87	$253	$0	$0	$0	$0	$844
20-Prelim Engineering/Env Review	798	500	2,410	1,055	0	0	0	0	4,763
40-Row Acquisition+Permits	3	0	188	10	0	0	0	0	201
Total	$1,205	$600	$2,685	$1,318	$0	$0	$0	$0	$5,808

Project Risk Assessment

There is risk with the uncertainties in siting, design, environmental, third party and jurisdictional requirements that could influence the budget and schedule.

System Expansion

REGIONAL EXPRESS

500086 **Bus on Shoulder** **Managed by: PEPD**

Design and implement freeway shoulder improvements to enable buses to use shoulders on freeways and state route facilities during periods of congestion along I-5.

Changes in authorized project allocation since 2019: None.

Budget year activities: Continue feasibility study with potential other candidates. Advance task order with WSDOT for final design, cost estimate and environmental for the selected candidates.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$3,878
2020 TIP:	$3,878

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$123,415
2019 Cost Estimate:	$123,415
2020 Cost Estimate:	$123,415

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$297	$513	$516	$4	$0	$0	$0	$0	$1,330
South King	297	513	516	4	0	0	0	0	1,330
Pierce	272	469	472	4	0	0	0	0	1,218
Total	$867	$1,495	$1,504	$12	$0	$0	$0	$0	$3,878

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$136	$135	$185	$0	$0	$0	$0	$0	$456
20-Prelim Engineering/Env Review	100	250	195	0	0	0	0	0	545
30-Final Design+Specifications	0	1,000	1,000	0	0	0	0	0	2,000
35-Third Party	362	0	10	0	0	0	0	0	372
40-Row Acquisition+Permits	0	10	15	0	0	0	0	0	25
50-Construction	268	100	100	12	0	0	0	0	480
Total	$867	$1,495	$1,504	$12	$0	$0	$0	$0	$3,878

Project Risk Assessment

The risk exists that the selected candidates can finally not be eligible when environmental and design are done.

System Expansion

REGIONAL EXPRESS

500110 **RapidRide C and D** **Managed by: PEPD**

Design and construct transit priority improvements along King County Metro's RapidRide C and D lines that provide service to Ballard and West Seattle to improve speed and reliability in advance of light rail operations.

Changes to authorized project allocation since 2019: Increased by $62.65 million to fund anticipated inter-governmental agreements with King County Metro and City of Seattle for RapidRide C and D and Madison Street BRT improvements.

Budget year activities: Enter into inter-local agreements with City of Seattle and King County Metro KCM to partially fund the City's Madison Street BRT project, and reimburse the City and KCM for selected RapidRide C and D improvement projects.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$2,350
2020 TIP:	$65,000

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$78,647
2019 Cost Estimate:	$77,777
2020 Cost Estimate:	$77,777

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$661	$5,495	$15,020	$17,395	$17,245	$9,184	$0	$0	$65,000
Total	$661	$5,495	$15,020	$17,395	$17,245	$9,184	$0	$0	$65,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$61	$95	$120	$145	$145	$184	$0	$0	$750
20-Prelim Engineering/Env Review	600	400	400	250	100	0	0	0	1,750
35-Third Party	0	5,000	14,500	17,000	17,000	9,000	0	0	62,500
Total	$661	$5,495	$15,020	$17,395	$17,245	$9,184	$0	$0	$65,000

Project Risk Assessment

Schedule risk exists as the coordination of multiple jurisdictions to achieve mutual agreement to complete the deliverables by 2024.

System Expansion

REGIONAL EXPRESS

500111 **Pacific Ave SR 7 Bus Rapid Transit** **Managed by: PEPD**

Capped capital contribution to Pierce Transit for bus capital enhancements for speed, reliability and convenience along Pacific Avenue / State Route 7 (SR7) in Tacoma and Pierce County.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue to support project development, design and environmental activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$60,500
2020 TIP:	$60,500

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$71,630
2019 Cost Estimate:	$69,815
2020 Cost Estimate:	$69,815

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$2,542	$10,590	$24,165	$21,665	$1,538	$0	$0	$0	$60,500
Total	$2,542	$10,590	$24,165	$21,665	$1,538	$0	$0	$0	$60,500

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$42	$90	$165	$165	$38	$0	$0	$0	$500
35-Third Party	2,500	10,500	24,000	21,500	1,500	0	0	0	60,000
Total	$2,542	$10,590	$24,165	$21,665	$1,538	$0	$0	$0	$60,500

Project Risk Assessment

N/A.

System Expansion

REGIONAL EXPRESS

500117 **North Sammamish Park-and-Ride** **Managed by: PEPD**

Plan, design, and construct a park and ride facility in the city of Sammamish.

Changes to authorized project allocation since 2019: None.

Budget year activities: Conduct conceptual engineering, conceptual design and environmental review of the preferred park-and-ride site. Continue working in partnership with the City of Sammamish, King County Metro and the public to gain input and feedback on early design concepts. Develop partnership agreements as necessary with the City of Sammamish, King County Metro and/or private development partners.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$2,065
2020 TIP:	$2,065

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$24,254
2019 Cost Estimate:	$24,190
2020 Cost Estimate:	$24,190

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
East King	$248	$765	$1,052	$0	$0	$0	$0	$0	$2,065
Total	$248	$765	$1,052	$0	$0	$0	$0	$0	$2,065

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$240	$220	$290	$0	$0	$0	$0	$0	$750
20-Prelim Engineering/Env Review	8	520	577	0	0	0	0	0	1,105
35-Third Party	0	20	140	0	0	0	0	0	160
40-Row Acquisition+Permits	0	5	45	0	0	0	0	0	50
Total	$248	$765	$1,052	$0	$0	$0	$0	$0	$2,065

Project Risk Assessment

Budget and schedule risk associated with the city's preferences and zoning codes which favor structured parking even though the ST3 cost estimate was based on a surface parking scenario. Budget and schedule risk is also associated with the strong possibility of a joint development project delivery approach, as well as high market costs for property and a tightening construction market.

System Expansion

REGIONAL EXPRESS

5X387 **I-90 Two-Way Transit & HOV Operations, Stage 3** **Managed by: DECM**

Plan, design, and construct freeway improvements to achieve reliable two-way transit and HOV operations eastbound and westbound on I-90 between 80th Avenue SE on Mercer Island and Rainier Avenue/I-5 in Seattle.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue the administrative closeout process.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$225,648
2019 TIP:	$225,648
2020 TIP:	$225,648

Completion Schedule	
Baseline:	2020
2019 :	2019
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$109,222
2019 Cost Estimate:	$225,648
2020 Cost Estimate:	$225,648

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
East King	$198,405	$1,570	$3,771	$2,555	$2,555	$285	$0	$16,508	$225,648
Total	$198,405	$1,570	$3,771	$2,555	$2,555	$285	$0	$16,508	$225,648

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2,509	$100	$55	$55	$55	$35	$0	$839	$3,648
20-Prelim Engineering/Env Review	1,549	0	0	0	0	0	0	0	1,549
30-Final Design+Specifications	18,451	100	0	0	0	0	0	3,570	22,121
50-Construction	175,896	1,370	3,716	2,500	2,500	250	0	12,099	198,330
Total	$198,405	$1,570	$3,771	$2,555	$2,555	$285	$0	$16,508	$225,648

Project Risk Assessment

There is a risk that final commissioning of Supervisory Control And Data Acquisition (SCADA) system may delay the project schedule.

System Expansion

REGIONAL EXPRESS

700720	ST Express Fleet Expansion	Managed by: Operations

Procure, accept, and commission 44 buses to support peak hour bus service demands.

Changes to authorized project allocation since 2019: None.

Budget year activities: Delivery, testing and commissioning of 19 buses.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$46,757
2020 TIP:	$46,757

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$46,008
2019 Cost Estimate:	$64,972
2020 Cost Estimate:	$64,972

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$2,992	$2,852	$0	$0	$0	$0	$0	$0	$5,845
South King	2,609	2,487	0	0	0	0	0	0	5,096
East King	17,332	16,519	0	0	0	0	0	0	33,852
Pierce	1,005	958	0	0	0	0	0	0	1,964
Total	$23,940	$22,817	$0	$0	$0	$0	$0	$0	$46,757

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
70-Vehicles	$23,940	$22,817	$0	$0	$0	$0	$0	$0	$46,757
Total	$23,940	$22,817	$0	$0	$0	$0	$0	$0	$46,757

Project Risk Assessment

Some risk exists with the uncertainty of the composition of the fleet with bus type, size and fuel as well as our transit partners ability to base and maintain our buses as we approach base capacities which could effect final cost.

2020 Cashflow by Budget Approval

(in thousands)

System Expansion

STRIDE

Project Number and Name		Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Preliminary Engineering										
500050	I-405 Bus Rapid Transit	$67,745	$63,298	$45,910	$32,175	$16,887	$103	$0	$0	$226,118
500051	SR 522/NE 145th St BRT	18,061	27,178	10,095	9,041	0	0	0	0	64,375
500070	Bus Base North	26,401	2,090	11,055	3,000	3,300	2,830	0	0	48,676
	Subtotal	112,207	92,566	67,061	44,216	20,187	2,933	0	0	339,169
	Total	$112,207	$92,566	$67,061	$44,216	$20,187	$2,933	$0	$0	$339,169

System Expansion

STRIDE

2020 Cashflow by Subarea

(in thousands)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
1 - Snohomish	$3,107	$2,158	$1,880	$1,161	$666	$97	$0	$0	$9,068
2 - North King	10,258	15,437	5,734	5,135	0	0	0	0	36,565
3 - South King	19,394	13,470	11,735	7,246	4,158	604	0	0	56,608
4 - East King	79,447	61,501	47,712	30,674	15,362	2,232	0	0	236,928
Total	$112,207	$92,566	$67,061	$44,216	$20,187	$2,933	$0	$0	$339,169

2020 Cashflow by Phase

(in thousands)

Phase # and Description	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$7,548	$5,345	$6,118	$0	$0	$0	$0	$0	$19,011
20-Prelim Engineering/Env Review	25,167	29,438	14,438	0	0	0	0	0	69,043
35-Third Party	423	380	1,751	0	0	0	0	0	2,554
40-Row Acquisition+Permits	46,562	12,012	9,287	1,975	847	0	0	0	70,681
50-Construction	32,507	44,780	32,072	39,041	15,840	0	0	0	164,240
55-Construction Services	0	612	3,395	3,200	3,500	2,933	0	0	13,640
Total	$112,207	$92,566	$67,061	$44,216	$20,187	$2,933	$0	$0	$339,169

System Expansion | STRIDE

500050 | **I-405 Bus Rapid Transit** | **Managed by: PEPD**

Plan, design, and launch a Bus Rapid Transit (BRT) system from the Lynnwood Transit Center to the Burien Transit Center via I-5, I-405, and SR 518, to include new and upgraded transit centers, flyer stops, new park-and-ride capacity, and access improvements to the stations.

Changes to authorized project allocation since 2019: Increased by $5 million to fund Phase 3 Preliminary Engineering and early GEC consultant oversight.

Budget year activities: Continue project development activities, right of way appraisals and acquisitions, and the preliminary engineering of the Washington State Department of Transportation (WSDOT) 85th Street Interchange and Brickyard In-Line Freeway Station. Completion of environmental review and approval. Continue construction with WSDOT at NE 44th Street Interchange.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$221,167
2020 TIP:	$226,118

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$989,681
2019 Cost Estimate:	$989,681
2020 Cost Estimate:	$985,246

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$2,315	$2,095	$1,548	$1,071	$567	$12	$0	$0	$7,608
South King	13,850	13,031	9,413	6,616	3,465	10	0	0	46,386
East King	51,581	48,172	34,949	24,488	12,854	81	0	0	172,124
Total	$67,745	$ 63,298	$ 45,910	$ 32,175	$ 16,887	$103	$0	$0	$226,118

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$3,942	$2,700	$1,644	$0	$0	$0	$0	$0	$8,286
20-Prelim Engineering/Env Review	18,839	22,368	8,519	0	0	0	0	0	49,726
35-Third Party	230	180	540	0	0	0	0	0	950
40-Row Acquisition+Permits	20,334	8,000	5,008	1,975	847	0	0	0	36,163
50-Construction	24,400	30,000	30,000	30,000	15,840	0	0	0	105,840
55-Construction Services	0	50	200	200	200	103	0	0	753
Total	$67,745	$63,298	$45,910	$32,175	$16,887	$103	$0	$0	$226,118

Project Risk Assessment

Agency wide risk in the timely acquisition of right-of-way remains a challenge. Multi-jurisdiction coordination on stations.

System Expansion | STRIDE

500051 | **SR 522/NE 145th St BRT** | **Managed by: PEPD**

Plan, design, and launch a Bus Rapid Transit (BRT) system from the South Shoreline light rail station to UW Bothell campus with connecting service to Woodinville, including park and ride, access improvements, and transit centers.

Changes to project allocation since 2019: Increased by $12 million to fund Phase 3 of preliminary engineering, construction service for pre-acquisition, acquisition, appraisal services for right of way.

Budget year activities: Complete conceptual engineering and environmental reviews, advance into phase 3 engineering. Continue construction of the Business Access and Transit (BAT) lanes in Bothell. Negotiate and coordinate with WSDOT and City of Bothell to start design. Negotiate and advance contract for design and construction management. Begin acquisition activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$52,556
2020 TIP:	$64,375

Completion Schedule	
Baseline:	N/A
2019 :	2025
2020 :	2025

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$482,840
2019 Cost Estimate:	$480,945
2020 Cost Estimate:	$480,945

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$10,258	$15,437	$5,734	$5,135	$0	$0	$0	$0	$36,565
East King	7,802	11,741	4,361	3,906	0	0	0	0	27,810
Total	$18,061	$27,178	$10,095	$9,041	$0	$0	$0	$0	$64,375

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2,911	$1,605	$1,785	$0	$0	$0	$0	$0	$6,301
20-Prelim Engineering/Env Review	5,231	6,840	4,941	0	0	0	0	0	17,012
35-Third Party	193	150	1,101	0	0	0	0	0	1,444
40-Row Acquisition+Permits	1,620	3,712	0	0	0	0	0	0	5,331
50-Construction	8,107	14,780	2,072	9,041	0	0	0	0	34,000
55-Construction Services	0	92	195	0	0	0	0	0	287
Total	$18,061	$27,178	$10,095	$9,041	$0	$0	$0	$0	$64,375

Project Risk Assessment

Early deliverable project, which involves close coordination with multiple project partners. Cost escalation and right of way acquisition challenges create budget and schedule uncertainty.

System Expansion | STRIDE

500070 | **Bus Base North** | **Managed by: PEPD**

Plan, design, and launch a bus operations and maintenance facility to support both the I-405 Bus Rapid Transit and the SR 522/NE 145th St. Bus Rapid Transit projects.

Changes to authorized project allocation since 2019: Increased by $11.6 million to fund design-build project management services.

Budget year activities: Continue project development activities and right of way acquisition activities. Completion of environmental review and approval. Begin procurement of design-build contract.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$37,076
2020 TIP:	$48,676

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$183,569
2019 Cost Estimate:	$183,569
2020 Cost Estimate:	$182,746

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$792	$63	$332	$90	$99	$85	$0	$0	$1,460
South King	5,544	439	2,322	630	693	594	0	0	10.22
East King	20,065	1,588	8,402	2,280	2,508	2,151	0	0	36.99
Total	$26,401	$2,090	$11,055	$3,000	$3,300	$2,830	$0	$0	$48,676

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$696	$1,040	$2,688	$0	$0	$0	$0	$0	4,424
20-Prelim Engineering/Env Review	1,097	230	978	0	0	0	0	0	2,305
35-Third Party	0	50	110	0	0	0	0	0	160
40-Row Acquisition+Permits	24,608	300	4,279	0	0	0	0	0	29,187
50-Construction	0	0	0	0	0	0	0	0	24,400
55-Construction Services	0	470	3,000	3,000	3,300	2,830	0	0	12,600
Total	$26,401	$2,090	$11,055	$3,000	$3,300	$2,830	$0	$0	48,676

Project Risk Assessment

Agency wide risk in the timely acquisition of right-of-way remains a challenge. Multi-jurisdiction coordination on stations.

2020 Cashflow by Budget Approval

(in thousands)

System Expansion

OTHER

Project Number and Name		Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Preliminary Engineering										
600038	Next Generation ORCA	$3,139	$2,968	$18,826	$2,130	$4,459	$0	$0	$0	$31,523
600143	Environmental Remediation	0	500	0	0	0	0	0	0	500
	Subtotal	3,139	3,468	18,826	2,130	4,459	0	0	0	32,023
Operating										
600668	STart Operations & Maintenance	1,598	321	313	426	480	509	530	15,183	19,359
	Subtotal	1,598	321	313	426	480	509	530	15,183	19,359
Program										
3X212	Fare Collection	8,919	17	81	108	73	112	88	5,474	14,870
5X410	Research & Technology	11,295	3,100	1,425	507	0	0	0	3,673	20,000
600016	Fare Administration	2,851	630	879	504	454	354	150	121	5,941
600039	Research and Business Development Program	109	534	499	0	0	0	0	0	1,143
600073	Transit System Access Program	1,717	5,900	5,750	5,750	6,000	6,000	5,700	105,322	142,139
600076	Innovation and Technology Program	2,588	2,425	2,178	2,253	2,355	2,436	7,373	84,996	106,604
600132	Efficiency & Sustainability	5	896	747	800	800	810	850	20,092	25,000
6X668	STart	26,941	6,303	9,081	6,674	6,998	6,313	3,338	95,553	161,201
804100	Transit Oriented Development Property Disposition	6,150	1,221	808	613	416	2,407	0	0	11,615
804302	Transit Oriented Development Planning Program	133	1,065	1,160	1,050	1,150	25,613	0	0	30,171
809100	ST3 Planning	26,766	3,087	1,975	1,825	625	625	341	6,283	41,527
	Subtotal	87,475	25,177	24,582	20,083	18,870	44,670	17,840	321,514	560,212
	Total	$92,212	$28,966	$43,721	$22,640	$23,809	$45,179	$18,370	$336,697	$611,594

2020 Cashflow by Subarea

(in thousands)

System Expansion

OTHER

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
1 - Snohomish	$8,768	$2,679	$3,289	$2,777	$2,905	$2,765	$2,033	$47,284	$72,500
2 - North King	15,118	4,903	4,796	3,909	3,875	5,669	2,309	54,529	95,108
3 - South King	5,755	1,695	1,900	1,734	1,801	1,764	1,469	31,545	47,663
4 - East King	6,820	2,626	3,202	2,702	2,834	2,692	1,986	45,380	68,242
5 - Pierce	8,864	2,359	2,844	2,449	2,552	2,451	1,859	42,794	66,172
6 - Systemwide	46,887	14,705	27,689	9,069	9,843	29,838	8,714	115,165	261,909
Total	$92,212	$28,966	$43,721	$22,640	$23,809	$45,179	$18,370	$336,697	$611,594

2020 Cashflow by Phase

(in thousands)

Phase # and Description	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$125	$17	$23	$37	$15	$17	$50	$527	$810
02-Operation+Maintenance-Agency	1,003	242	163	182	228	249	262	11,215	13,543
10-Agency Administration	15,109	4,888	4,874	3,751	6,634	8,964	7,635	24,083	75,937
20-Prelim Engineering/Env Review	27,043	8,016	5,824	4,217	3,276	15,072	1,890	95,923	161,260
26-Research+Technology	11,641	2,544	17,285	1,815	812	0	0	2,018	36,115
30-Final Design+Specifications	0	0	150	150	150	150	150	3,018	3,768
35-Third Party	637	5,450	5,275	5,275	5,275	5,275	5,275	90,523	122,985
40-Row Acquisition+Permits	3,708	1,261	930	375	375	9,284	0	0	15,933
50-Construction	8,390	896	767	834	736	566	500	22,175	34,865
61-Art	24,556	5,653	8,431	6,004	6,308	5,603	2,608	87,216	146,379
Total	$92,212	$28,966	$43,721	$22,640	$23,809	$45,179	$18,370	$336,697	$611,594

System Expansion OTHER

3X212 **Fare Collection** **Managed by: ITS**

Maintenance of Agency fare collection and enforcement systems, as required, including: Ticket Vending Machines (TVMs), One Regional Card for All (ORCA) payment reader system for Link, secure payment requirements, and electronic citation system and hardware for fare validation and enforcement.

Changes to authorized project allocation since 2019: None.

Budget year activities: Install a system-wide upgrade to the operating software that will improve system security compliance and performance; continue implementation of electronic citation system for fare enforcement.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$14,870
2020 TIP:	$14,870

Completion Schedule	
Baseline:	N/A
2019 :	2025
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$1,980	$4	$18	$24	$16	$25	$19	$1,215	$3,301
South King	3,220	6	29	39	26	41	32	1,976	5,368
East King	250	0	2	3	2	3	2	153	416
Pierce	3,469	6	31	42	28	44	34	2,129	5,785
Total	$8,919	$17	$81	$108	$73	$112	$88	$5,474	$14,870

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$110	$17	$23	$37	$15	$17	$50	$527	$795
10-Agency Administration	717	0	0	0	58	96	37	100	1,008
20-Prelim Engineering/Env Review	150	0	0	0	0	0	0	0	150
50-Construction	7,942	0	57	71	0	0	0	4,847	12,917
Total	$8,919	$17	$81	$108	$73	$112	$88	$5,474	$14,870

Project Risk Assessment

The risk to budget remains high until assessment of the condition of the fielded assets and associated repair and replacement costs are completed.

System Expansion OTHER

5X410 **Research & Technology** **Managed by: ITS**

Assess current implementation of the technology network, including capacity constraints; assess the new desired state as dictated by ST3; and develop a roadmap that provides remediation of design concerns, state of good repair for aging components, system expansion needs, and support for a new, ongoing operational model for network support.

Changes to authorized project allocation since 2019: None.

Budget year activities: Identify existing gaps in information system's network to support increased capacity demands, and establish cost estimates for implementation.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$20,000
2020 TIP:	$20,000

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$11,295	$3,100	$1,425	$507	$0	$0	$0	$3,673	$20,000
Total	$11,295	$3,100	$1,425	$507	$0	$0	$0	$3,673	$20,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,505	$975	$525	$0	$0	$0	$0	$1,595	$4,600
20-Prelim Engineering/Env Review	2,040	2,100	900	0	0	0	0	60	5,100
26-Research+Technology	7,750	25	0	507	0	0	0	2,018	10,300
Total	$11,295	$3,100	$1,425	$507	$0	$0	$0	$3,673	$20,000

Project Risk Assessment

Elements of this program are in various stages of design and include new technologies that require custom software development which creates budget and schedule risk while a project progresses from an idea or concept to a fully scoped project. Extensive coordination with external partner agencies adds a level of schedule risk.

System Expansion OTHER

600016 Fare Administration Managed by: FIN

Manage the fares, pricing, and fare collection program for Sound Transit. Provide funding for the maintenance, upgrade, and installation of the existing regional smart card system (ORCA).

Additional elements of the program include monitoring fare revenues and tracking performance, and establishing pricing for cash fares, retail passes, and business accounts: Manage the fare change process: Administer the Sound Transit Fare Policy; and maintain the fare elasticity and revenue projection models.

Changes to authorized project allocation since 2019: Increased by $500 thousand to include Transit Coordination grant.

Budget year activities: Management of fares program including, implementation of fare changes, expanding outreach of the ORCA LIFT program, promotions for ORCA system enhancements to legacy ORCA system, equipment replacement and mobile ticketing.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$5,441
2020 TIP:	$5,941

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2026

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$2,851	$630	$879	$504	$454	$354	$150	$121	$5,941
Total	$2,851	$630	$879	$504	$454	$354	$150	$121	$5,941

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$0	$0	$0	$0	$0	$0	$0	$0
20-Prelim Engineering/Env Review	1,879	630	879	504	454	354	150	121	4,969
26-Research+Technology	972	0	0	0	0	0	0	0	972
Total	$2,851	$630	$879	$504	$454	$354	$150	$121	$5,941

Project Risk Assessment

ORCA is a regional universal fare payment system. The equipment and software technology that currently supports the program is approaching the end of its useful life. The risk to budget is the uncertainty of cost when the system scope to be designed and implemented has not been identified, nor has the associated equipment to support the program.

System Expansion OTHER

600038 Next Generation ORCA Managed by: FIN

Funding for Sound Transit's share of costs related to the planning, development and implementation of a next generation ORCA fare collection system.

Changes in authorized project allocation since 2019: None.

Budget year activities: Finalize design, start software development of the system. Design and begin production of system devices, including preliminary acceptance testing of devices. Continued development of the DARe data warehouse.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$31,523
2020 TIP:	$31,523

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$3,139	$2,968	$18,826	$2,130	$4,459	$0	$0	$0	$31,523
Total	$3,139	$2,968	$18,826	$2,130	$4,459	$0	$0	$0	$31,523

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$221	$449	$1,542	$823	$3,647	$0	$0	$0	$6,680
26-Research+Technology	2,919	2,519	17,285	1,308	812	0	0	0	24,842
Total	$3,139	$2,968	$18,826	$2,130	$4,459	$0	$0	$0	$31,523

Project Risk Assessment

The program is schedule-driven so that it may be delivered prior to the sunset of the current ORCA system and in time for the region's planned transit expansions. While there is some schedule risk, it is actively being mitigated by focused schedule tracking and milestone achievement. Another key risk relates to the cutover from the current ORCA system to the next generation system. The program will work with the Systems Integrator to ensure that there will be as smooth a transition for customers as possible.

System Expansion OTHER

600039 Research and Business Development Program Managed by: PEPD

Research and develop business practices to improve regional mobility and system efficiency. Develop data-driven strategies and tools to support the agency in improving the match between market needs and system performance.

Changes to authorized project allocation since 2019: None.

Budget year activities: Fund data collection to support system accessibility research and provide local grant-match support for a proposed mobility research project by the University of Washington.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,143
2020 TIP:	$1,143

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$109	$534	$499	$0	$0	$0	$0	$0	$1,143
Total	$109	$534	$499	$0	$0	$0	$0	$0	$1,143

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$61	$240	$279	$0	$0	$0	$0	$0	$580
20-Prelim Engineering/Env Review	49	294	220	0	0	0	0	0	563
Total	$109	$534	$499	$0	$0	$0	$0	$0	$1,143

Project Risk Assessment

The project risk is minimal as the policy review is limited by available funds.

System Expansion OTHER

600073 Transit System Access Program Managed by: PEPD

Invest in additional non-motorized, transit, and pick-up/drop-off access improvements at and around Sound Transit passenger facilities, in partnership with host jurisdictions and operating partners.

Changes to authorized project allocation since 2019: None.

Budget year activities: Negotiate individual awardee agreements to set the terms of distribution of financial awards consistent with the scope of the individual project. Begin initial distribution of 2020 awards.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$142,139
2020 TIP:	$142,139

Completion Schedule	
Baseline:	N/A
2019 :	2040
2020 :	2040

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$343	$1,180	$1,150	$1,150	$1,200	$1,200	$1,140	$21,064	$28,428
North King	343	1,180	1,150	1,150	1,200	1,200	1,140	21,064	28,428
South King	343	1,180	1,150	1,150	1,200	1,200	1,140	21,064	28,428
East King	343	1,180	1,150	1,150	1,200	1,200	1,140	21,064	28,428
Pierce	343	1,180	1,150	1,150	1,200	1,200	1,140	21,064	28,428
Total	$1,717	$5,900	$5,750	$5,750	$6,000	$6,000	$5,700	$105,322	$142,139

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,173	$500	$500	$500	$500	$500	$500	$6,327	$10,500
20-Prelim Engineering/Env Review	544	400	250	250	500	500	200	3,256	5,900
35-Third Party	0	5,000	5,000	5,000	5,000	5,000	5,000	89,985	119,985
50-Construction	0	0	0	0	0	0	0	5,754	5,754
Total	$1,717	$5,900	$5,750	$5,750	$6,000	$6,000	$5,700	$105,322	$142,139

Project Risk Assessment

Third-party interest in the fund may introduce schedule risks as well as indicate needs in excess of resources available, possible affecting the ability to support qualifying projects.

System Expansion OTHER

600076 **Innovation and Technology Program** **Managed by: PEPD**

Research, analysis, and implementation of innovative best practices, partnership and technologies to increase ridership, improve service, and enhance efficiency of regional mobility outside of new investments in large capital projects.

Changes to authorized project allocation since 2019: None.

Budget year activities: Setup of internal grant program; video analytics research/pilots, JRD Smart Step Escalator sensor, customer services Chabot, and Find it-Fix it app.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$106,604
2020 TIP:	$106,604

Completion Schedule	
Baseline:	N/A
2019 :	2041
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$84,865
2019 Cost Estimate:	$84,865
2020 Cost Estimate:	$84,865

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$2,588	$2,425	$2,178	$2,253	$2,355	$2,436	$7,373	$84,996	$106,604
Total	$2,588	$2,425	$2,178	$2,253	$2,355	$2,436	$7,373	$84,996	$106,604

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2,021	$933	$1,028	$1,064	$1,102	$1,141	$6,036	$0	$13,325
20-Prelim Engineering/Env Review	567	1,492	1,150	1,189	1,253	1,295	1,337	84,996	93,279
Total	$2,588	$2,425	$2,178	$2,253	$2,355	$2,436	$7,373	$84,996	$106,604

Project Risk Assessment

Many planned/potential projects rely on partnership with other agencies and organizations, which introduce additional scope, schedule, and cost risks.

System Expansion OTHER

600132 **Efficiency & Sustainability** **Managed by: PEPD**

System wide resource conservation and pollution mitigation projects, with a focus on projects that reduce long-term operations & maintenance, utility and fuel costs. These projects will be focused on existing facilities and system wide improvements that provide resource conservation opportunities across new and existing facilities. The resource efficiency projects developed in this program will be managed by agency staff and planned, designed and constructed by consultants.

Changes to authorized project allocation since 2019: None.

Budget year activities: Assess and prioritize energy efficiency audits and renewable energy assessments and resource efficiency improvements in the Planning, Environment and Project Department (PEPD) and the Operations Department.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$25,000
2020 TIP:	$25,000

Completion Schedule	
Baseline:	N/A
2019 :	2041
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$5	$896	$747	$800	$800	$810	$850	$20,092	$25,000
Total	$5	$896	$747	$800	$800	$810	$850	$20,092	$25,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2	$0	$0	$0	$0	$10	$50	$3,755	$3,818
20-Prelim Engineering/Env Review	0	0	150	150	150	150	150	1,745	2,495
30-Final Design+Specifications	0	0	150	150	150	150	150	3,018	3,768
50-Construction	3	896	447	500	500	500	500	11,574	14,920
Total	$5	$896	$747	$800	$800	$810	$850	$20,092	$25,000

Project Risk Assessment

N/A.

System Expansion OTHER

600143 **Environmental Remediation** **Managed by: PEPD**

In compliance with the Model Toxics Control Act prepared, prioritize for further evaluation for a site remediation clean-up strategy and/or administrative closure ten sites which require identification of data gaps, conducting additional investigation and/or remediation design where appropriate.

Changes to authorized project allocation since 2019: New project of $500 thousand to commence identification of environmental remediation of 10 Sound Transit owned properties.

Budget year activities: Identification of data gaps, conducting additional investigation and/or remediation design where appropriate on ten identified Sound Transit owned parcels.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$500

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$0	$500	$0	$0	$0	$0	$0	$0	$500
Total	$0	$500	$0	$0	$0	$0	$0	$0	$500

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$50	$0	$0	$0	$0	$0	$0	$50
20-Prelim Engineering/Env Review	0	450	0	0	0	0	0	0	450
Total	$0	$500	$0	$0	$0	$0	$0	$0	$500

Project Risk Assessment

N/A.

System Expansion OTHER

600668 **STart Operations & Maintenance** **Managed by: DECM**

Maintain Sound Transit installed art, including documentation, monitoring, cleaning, repair and possible replacement.

Changes to authorized project allocation since 2019: None.

Budget year activities: Clean over 75 artworks at transit facilities through new on-call vendor. Additional artwork refurbishment and scheduled maintenance will be performed at Sounder's Auburn, Kent, and Mukilteo stations, along with Link's SoDo Station, SeaTac Airport, and Tukwila International Boulevard stations.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$19,344
2020 TIP:	$19,344

Completion Schedule	
Baseline:	N/A
2019 :	2025
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$359	$72	$71	$96	$108	$115	$120	$3,428	$4,370
North King	481	97	94	129	145	154	160	4,581	5,841
South King	122	25	24	33	37	39	41	1,166	1,486
East King	347	70	68	93	105	111	116	3,313	4,222
Pierce	282	57	55	75	85	90	94	2,687	3,425
Total	$1,591	$321	$313	$426	$480	$509	$530	$15,176	$19,344

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$7	$0	$0	$0	$0	$0	$0	$0	$7
02-Operation+Maintenance-Agency	1,003	201	163	182	228	249	262	11,208	13,495
10-Agency Administration	580	120	150	244	252	260	268	3,968	5,842
Total	$1,591	$321	$313	$426	$480	$509	$530	$15,176	$19,344

Project Risk Assessment

N/A.

System Expansion OTHER

6X668 **STart** **Managed by: DECM**

Incorporate art into Sound Transit facilities reflecting the communities served and contribute to a positive experience for customers.

The Board supports a public art budget of one percent of construction costs excluding tunneling for all Sound Move, ST2, and ST3 projects.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue fabrication and installation of art projects for East Link and Northgate Link extensions. Continue artwork design for Lynnwood Link and Tacoma Link extensions. Artwork design for Federal Way Link and Downtown Redmond Link. Begin artwork planning for Sumner and Puyallup parking garages. Begin design for BRT shelter at intersection of I-405 and SR522 corridors. One project manager position added.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$161,201
2020 TIP:	$161,201

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	$58,480
2020 Cost Estimate:	$157,760

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$6,083	$1,423	$2,050	$1,507	$1,580	$1,425	$754	$21,576	$36,399
North King	8,141	1,905	2,744	2,017	2,115	1,908	1,009	28,876	48,715
South King	2,069	484	697	513	537	485	256	7,339	12,380
East King	5,878	1,375	1,981	1,456	1,527	1,377	728	20,850	35,174
Pierce	4,768	1,116	1,607	1,181	1,239	1,117	591	16,913	28,533
Total	$26,941	$6,303	$9,081	$6,674	$6,998	$6,313	$3,338	$95,553	$161,201

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2,385	$650	$650	$670	$690	$710	$730	$8,337	$14,822
61-Art	24,556	5,653	8,431	6,004	6,308	5,603	2,608	87,216	146,379
Total	$26,941	$6,303	$9,081	$6,674	$6,998	$6,313	$3,338	$95,553	$161,201

Project Risk Assessment

N/A.

System Expansion OTHER

804100 **Transit Oriented Development Property Disposition** **Managed by: PEPD**

Provide planning and technical assistance to local jurisdictions and Sound Transit (ST) project teams to help identify and shape transit oriented development and joint development opportunities. Dispose of properties that have been declared surplus and are suitable for transit oriented development based on size and proximity to ST transit services.

Changes to authorized project allocation since 2019: None.

Budget year activities: Assess joint development and public/private or public/public partnerships opportunities to develop Sound Transit owned sites near transit stations.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$11,615
2020 TIP:	$11,615

Completion Schedule	
Baseline:	N/A
2019 :	2021
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$6,150	$1,221	$808	$613	$416	$2,407	$0	$0	$11,615
Total	$6,150	$1,221	$808	$613	$416	$2,407	$0	$0	$11,615

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$2,004	$300	$0	$300	$135	$771	$0	$0	$3,510
20-Prelim Engineering/Env Review	0	50	50	50	44	0	0	0	194
40-Row Acquisition+Permits	3,701	871	495	0	0	1,570	0	0	6,637
50-Construction	446	0	263	263	236	66	0	0	1,274
Total	$6,150	$1,221	$808	$613	$416	$2,407	$0	$0	$11,615

Project Risk Assessment

N/A.

System Expansion OTHER

804302 **Transit Oriented Development Planning Program** **Managed by: PEPD**

Support Transit Oriented Development(TOD) planning and pre-development activities needed to identify, refine and shape the offering of TOD properties targeted by ST3 plan.

Changes to authorized project allocation since 2019: None.

Budget year activities: Support the West Seattle-Ballard Link Extensions, Downtown Redmond Link Extension, Federal Way Link Extension, Tacoma Dome Link Extension, I-405 BRT, and SR522/NE 145th BRT projects by funding the preparation of TOD implementation strategies and other pre-development activities for properties that may have joint development potential or that may become surplus to the agency.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$30,171
2020 TIP:	$30,171

Completion Schedule	
Baseline:	N/A
2019 :	2041
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$23,495
2019 Cost Estimate:	$23,495
2020 Cost Estimate:	$23,495

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$133	$1,065	$1,160	$1,050	$1,150	$25,613	$0	$0	$30,171
Total	$133	$1,065	$1,160	$1,050	$1,150	$25,613	$0	$0	$30,171

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$133	$125	$150	$100	$200	$5,426	$0	$0	$6,134
20-Prelim Engineering/Env Review	0	550	575	575	575	12,474	0	0	14,749
40-Row Acquisition+Permits	0	390	435	375	375	7,714	0	0	9,289
Total	$133	$1,065	$1,160	$1,050	$1,150	$25,613	$0	$0	$30,171

Project Risk Assessment

N/A

System Expansion OTHER

809100 **ST3 Planning** **Managed by: PEPD**

Support system expansion activities that are not corridor specific, including but not limited to ridership forecasting, operation analysis, environmental analysis, and pre-project development for future projects.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continued ridership forecasting, light rail operations analysis and environmental mitigation work with Department of Energy.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$41,527
2020 TIP:	$41,527

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$59,689
2019 Cost Estimate:	$34,607
2020 Cost Estimate:	$34,607

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$26,766	$3,087	$1,975	$1,825	$625	$625	$341	$6,283	$41,527
Total	$26,766	$3,087	$1,975	$1,825	$625	$625	$341	$6,283	$41,527

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
02-Operation+Maintenance-Agency	$0	$41	$0	$0	$0	$0	$0	$0	$41
10-Agency Administration	4,308	546	50	50	50	50	14	0	5,068
20-Prelim Engineering/Env Review	21,814	2,050	1,650	1,500	300	300	52	5,745	33,411
35-Third Party	637	450	275	275	275	275	275	538	3,000
40-Row Acquisition+Permits	7	0	0	0	0	0	0	0	7
Total	$26,766	$3,087	$1,975	$1,825	$625	$625	$341	$6,283	$41,527

Project Risk Assessment

Funding for this project was reduced in 2019 to the level needed to support anticipated work. Further reductions could jeopardize the agency's ability to advance unanticipated planning work on systemic issues not charged to specific projects.

2020 Cashflow by Budget Approval

(in thousands)

Enhancement

ALL MODES

Project Number and Name		Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Preliminary Engineering										
600084	Passenger Information Management System	$5,072	$8,958	$9,051	$6,447	$11,051	$8,446	$551	$0	$49,576
600085	SODO/MLK Hazard Mitigation	1,036	610	1,490	0	0	0	0	0	3,136
600145	Design Criteria Manual Update	0	200	0	0	0	0	0	0	200
700654	SeaTac Airport Second Elevator	0	745	2,684	2,642	0	0	0	0	6,070
700710	Locomotive Inboard Cameras	0	300	0	0	0	0	0	0	300
700723	Downtown Seattle & Regional Mobility Improvements	9,007	3,327	0	0	0	0	0	0	12,334
	Subtotal	15,115	14,140	13,225	9,089	11,051	8,446	551	0	71,616
Baseline										
300011	Positive Train Control	43,144	220	0	0	0	0	0	9,690	53,054
700730	Operations & Maintenance Facility Light Rail Vehicle Lift	3,764	1,134	0	0	0	0	0	0	4,898
	Subtotal	46,908	1,354	0	0	0	0	0	9,690	57,952
Operating										
5X261	Bus Maintenance Facility	9,390	0	12,643	0	0	0	0	0	22,033
600029	Tacoma Link Fare Collection	64	0	0	0	534	0	0	0	599
700651	SeaTac Airport Wrong Door Fall Protection	0	561	138	0	0	0	0	0	699
700665	Video Management System Upgrade	900	390	590	0	0	0	0	0	1,880
700676	Tacoma Link Radio Upgrade	748	0	0	0	0	0	0	0	748
700684	Light Rail Vehicle Wireless Communication Upgrade	146	0	259	0	0	0	0	0	405
700685	Everett Station Security Improvements	289	0	0	0	0	0	0	0	289
700686	Security Radio System	245	1,008	0	0	0	0	0	0	1,253
700687	Security Operations Center - Video Monitoring Improvements	241	0	0	0	0	0	0	0	241
700689	Pierce Transit - Global Positioning System Repeater	0	0	1,662	0	0	0	0	0	1,662
700690	Community Transit - On-Board Communication Upgrade	1,047	1,033	0	0	0	0	0	0	2,080

700691	Operations Maintenance Facility (OMF) - Link Control Center (LCC) Upgrades	50	566	0	0	0	0	0	0	616
700692	Operations Maintenance Facility (OMF) Expanded Parking	516	105	0	0	0	0	0	0	621
700693	Operations Maintenance Facility (OMF) - Renovations	2,971	5,654	2,480	0	0	0	0	0	11,105
700697	LRV Between Car Barriers	412	0	108	0	0	0	0	0	520
700706	OMF Energy Efficiency	1,048	0	50	0	0	0	0	0	1,098
700708	Customer Emergency Stations	243	0	557	0	0	0	0	0	800
700711	Sounder Passenger Emergency Intercom	0	1,500	0	0	0	0	0	0	1,500
700713	LRV Wash Bay Modifications	300	0	0	0	0	0	0	0	300
700724	Puyallup Station LED Lighting	151	0	27	0	0	0	0	0	178
700725	Sumner Station LED Lighting	104	0	30	0	0	0	0	0	134
700726	Kent Station Platform Lighting	140	0	96	0	0	0	0	0	236
700727	Kent Station Parking Lot Paving	76	0	624	0	0	0	0	0	700
700736	Union Station Garden Level Remodel	1,715	0	139	0	0	0	0	0	1,854
	Subtotal	20,798	10,817	19,401	0	534	0	0	0	51,552
Program										
400122	Escalator Modernization Program	1,800	3,427	10,500	9,700	8,000	2,520	2,320	6,960	45,227
4X340	Noise Abatement	9,432	900	750	699	672	547	0	0	13,000
600080	Bike Parking Program	2,334	2,284	1,367	2,008	1,706	0	0	0	9,700
600133	Parking Management Program	0	1,926	1,555	2,336	4,291	3,586	0	0	13,692
700688	LED Lighting Program	409	245	846	0	0	0	0	0	1,500
700781	Non-revenue Support Vehicles	1,793	3,014	1,342	0	0	0	0	0	6,149
700793	Signage Improvements	607	280	185	143	26	5	5	41	1,293
	Subtotal	16,375	12,075	16,545	14,886	14,695	6,658	2,325	7,001	90,561
	Total	$99,197	$38,387	$49,171	$23,975	$26,280	$15,105	$2,876	$16,691	$271,681

2020 Cashflow by Subarea

(in thousands)

Enhancement

ALL MODES

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
1 - Snohomish	$5,884	$1,312	$1,998	$0	$0	$0	$0	$688	$9,884
2 - North King	28,739	19,778	17,909	13,931	13,908	6,482	2,322	6,980	110,049
3 - South King	10,001	6,121	8,073	2,937	227	176	3	448	27,985
4 - East King	5,217	750	6,441	659	560	0	0	0	13,627
5 - Pierce	41,667	878	4,969	1	535	0	0	8,576	56,626
6 - Systemwide	7,687	9,548	9,780	6,447	11,051	8,446	551	0	53,510
Total	$99,197	$38,387	$49,171	$23,975	$26,280	$15,105	$2,876	$16,691	$271,681

2020 Cashflow by Phase

(in thousands)

Phase # and Description	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$0	$350	$855	$1,333	$1,887	$1,575	$0	$0	$6,000
10-Agency Administration	7,778	2,486	2,407	1,633	1,515	802	656	538	17,816
20-Prelim Engineering/Env Review	1,326	1,576	663	811	2,216	1,511	0	0	8,102
30-Final Design+Specifications	3,421	3,898	2,330	1,434	1,525	601	100	391	13,701
35-Third Party	12,397	3,170	0	0	200	200	0	367	16,334
40-Row Acquisition+Permits	75	0	0	0	0	0	0	0	75
50-Construction	69,000	22,918	40,147	17,763	17,937	10,116	1,920	8,669	188,470
55-Construction Services	3,277	975	1,426	1,000	1,000	300	200	3,642	11,820
70-Vehicles	1,793	3,014	1,342	0	0	0	0	0	6,149
80-System Testing+Startup	129	0	0	0	0	0	0	1,361	1,490
90-Contingency	0	0	0	0	0	0	0	1,725	1,725
Total	$99,197	$38,387	$49,171	$23,975	$26,280	$15,105	$2,876	$16,691	$271,681

Enhancement LINK

400122 **Escalator Modernization Program** **Managed by: DECM**

Design and implement modernization of escalators at University of Washington Station and upgrade emergency egress stairwells at University of Washington Station and Capitol Hill Station.

Since U-Link opened in 2016, the escalators at University of Washington (UW) have underperformed. The lack of stairs has made the problem worse, leading to multiple occasions where customers have had to line up for limited elevator space to either enter or exit the station. As committed to the Board in October 2018, due to an unanticipated reduction in service life, it is necessary to initiate the replacement of the escalators at this time. Project includes: Upgrades/replacement of 11 of 13 escalators; design and installing a set of permanent stairs in lieu of two of the current sets of escalators (two of the escalators to be removed for stairs.).

Changes to authorized project allocation since 2019: Increased by $40.26 million to design, procure and install escalators at University of Washington Station.

Budget year activities: Full modernization of 11 escalators at UW Station with appropriate specification of equipment. Improve public circulation paths via connected sub-mezzanines. Replace two (of the current 13) escalators with fixed public stair to provide permanent public access without dependence on escalator operation.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$4,963
2019 TIP:	$4,963
2020 TIP:	$45,227

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2026

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,800	$3,427	$10,500	$9,700	$8,000	$2,520	$2,320	$6,960	$45,227
Total	$1,800	$3,427	$10,500	$9,700	$8,000	$2,520	$2,320	$6,960	$45,227

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$302	$267	$800	$800	$800	$200	$100	$300	$3,569
30-Final Design+Specifications	263	500	800	600	600	100	100	300	3,263
50-Construction	1,195	2,375	7,900	7,300	5,600	1,920	1,920	5,760	33,970
55-Construction Services	40	285	1,000	1,000	1,000	300	200	600	4,425
Total	$1,800	$3,427	$10,500	$9,700	$8,000	$2,520	$2,320	$6,960	$45,227

Project Risk Assessment

Unknown conditions and feasibility studies tied to the escalator discovery stage and schedule represent high risk in terms of schedule and cost.

Enhancement LINK

4X340 **Noise Abatement** **Managed by: DECM**

Design and construct a noise wall along the Link elevated guideway in Tukwila. Funding for the completion of the Residential Sound Insulation Program (RSIP) for residences impacted by noise from operations of Central Link in the Rainier Valley is included in this project.

Scope addition in 2019 for periodic noise and vibration data collection and testing, wheel/rail interaction investigation and correlation of track/vehicle interaction to noise, vibration and maintenance issues between the years 2018 and 2023.

Changes to authorized project allocation since 2019: None.

Budget year activities: Noise and vibration data collection, wheel/rail interaction investigation and correlation of track/vehicle interaction to noise, vibration and maintenance issues.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$13,000
2020 TIP:	$13,000

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$6,440	$615	$512	$477	$459	$374	$0	$0	$8,876
South King	2,992	285	238	222	213	174	0	0	4,124
Total	$9,432	$900	$750	$699	$672	$547	$0	$0	$13,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,058	$50	$50	$49	$47	$46	$0	$0	$1,300
30-Final Design+Specifications	391	850	700	650	625	501	0	0	3,718
40-Row Acquisition+Permits	16	0	0	0	0	0	0	0	16
50-Construction	5,879	0	0	0	0	0	0	0	5,879
55-Construction Services	2,088	0	0	0	0	0	0	0	2,088
Total	$9,432	$900	$750	$699	$672	$547	$0	$0	$13,000

Project Risk Assessment

Delays in field trial completion resulting in prolonged test trial period; Delays in implementing newer wheel shapes in ST2 Original Equipment Manufacturer (OEM) vehicles.

Enhancement LINK

600029 **Tacoma Link Fare Collection** **Managed by: ITS**

Install and commission ticket vending machines at Tacoma Link stations, establish a spare parts inventory, set up fare collection and fare enforcement support, and conduct public outreach.

Changes to authorized project allocation since 2019: Increased by $85 thousand for change of hardware specification.

Budget year activities: None.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$514
2020 TIP:	$599

Completion Schedule	
Baseline:	N/A
2019 :	2022
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$64	$0	$0	$0	$534	$0	$0	$0	$599
Total	$64	$0	$0	$0	$534	$0	$0	$0	$599

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$64	$0	$0	$0	$534	$0	$0	$0	$599
Total	$64	$0	$0	$0	$534	$0	$0	$0	$599

Project Risk Assessment

Key project risks include: Further deferment of implementation; Next generation fare system changes across the region may affect contractor timelines for software and hardware development; Complications may be driven by the ability to reach intergovernmental agreements for fare enforcement, which may cause a delay once implementation is approved.

Enhancement LINK

700651 **SeaTac Airport Wrong Door Fall Protection** **Managed by: Operations**

Remove and replace 144 linear feet of handrails on the exterior side of the east and west platforms and fabricate and install new windscreens.

Changes to authorized project allocation since 2019: New project of $699 thousand for the installation and expansion of barriers at the SeaTac Airport Station to prevent passengers exiting the wrong door.

Budget year activities: Removal of approximately 144 linear feet of handrails on the exterior side of the east and west platforms to prepare for the installation of the new windscreens.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$699

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$0	$561	$138	$0	$0	$0	$0	$0	$699
Total	$0	$561	$138	$0	$0	$0	$0	$0	$699

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$63	$16	$0	$0	$0	$0	$0	$79
30-Final Design+Specifications	0	34	8	0	0	0	0	0	42
50-Construction	0	464	114	0	0	0	0	0	578
Total	$0	$561	$138	$0	$0	$0	$0	$0	$699

Project Risk Assessment

N/A.

Enhancement LINK

700654 **SeaTac Airport Second Elevator** **Managed by: Operations**

Design and construct a second elevator at the east side of the SeaTac/Airport Station pedestrian bridge.

Changes to authorized project allocation since 2019: New project for $6.1 million for design and construction of a second elevator at Airport Station.

Budget year activities: Commence the elevator design process to include site assessment, utility access, initial permitting and preliminary engineering and begin procurement process to award contract.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$6,070

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2022

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$0	$745	$2,684	$2,642	$0	$0	$0	$0	$6,070
Total	$0	$745	$2,684	$2,642	$0	$0	$0	$0	$6,070

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$112	$112	$112	$0	$0	$0	$0	$337
30-Final Design+Specifications	0	632	126	84	0	0	0	0	843
50-Construction	0	0	2,445	2,445	0	0	0	0	4,890
Total	$0	$745	$2,684	$2,642	$0	$0	$0	$0	$6,070

Project Risk Assessment

Both project and schedule risk exist as a the project has not completed a cost estimate. Schedule risk exists as the second elevator will have to installed during regular operations of the existing elevator.

Enhancement LINK

700676 **Tacoma Link Radio Upgrade** **Managed by: Operations**

Design, install. connect and commission a new low-power Simulcast digital mobile radio (DMR) radio system at each station linking the repeaters via fiber optic cable. Install a passive repeater at the existing traction power substation.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$748
2020 TIP:	$748

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$748	$0	$0	$0	$0	$0	$0	$0	$748
Total	$748	$0	$0	$0	$0	$0	$0	$0	$748

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$22	$0	$0	$0	$0	$0	$0	$0	$22
50-Construction	726	0	0	0	0	0	0	0	726
Total	$748	$0	$0	$0	$0	$0	$0	$0	$748

Project Risk Assessment

N/A.

Enhancement LINK

700684 **Light Rail Vehicle Wireless Communication Upgrade** **Managed by: Operations**

Plan and install a wireless solution that will support timely transmission of automated passenger count (APC) data, light rail vehicle (LRV) maintenance information, and future signage data such as passage alerts, emergency notifications and other important rider alerts.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$405
2020 TIP:	$405

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$98	$0	$173	$0	$0	$0	$0	$0	$270
South King	49	0	86	0	0	0	0	0	134
Total	$146	$0	$259	$0	$0	$0	$0	$0	$405

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
30-Final Design+Specifications	$0	$0	$30	$0	$0	$0	$0	$0	$30
50-Construction	146	0	229	0	0	0	0	0	375
Total	$146	$0	$259	$0	$0	$0	$0	$0	$405

Project Risk Assessment

N/A.

Enhancement LINK

700691 **Operations Maintenance Facility (OMF) - Link Control Center (LCC) Upgrades** **Managed by: Operations**

After buses leave the Downtown Seattle Transit Tunnel in 2019, the OMF: Central will become the new primary location for the LCC. This project will implement upgrades and enhancements for the OMF location to allow full functionality of the control center at the OMF.

Changes to authorized project allocation since 2019: Increased by $216 thousand to upgrade video wall.

Budget year activities: Remove the existing small overview display, install a full size and feature video wall to updated specifications, and perform option installations for large screen monitors.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$400
2020 TIP:	$616

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$33	$378	$0	$0	$0	$0	$0	$0	$411
South King	17	188	0	0	0	0	0	0	205
Total	$50	$566	$0	$0	$0	$0	$0	$0	$616

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$14	$0	$0	$0	$0	$0	$0	$14
30-Final Design+Specifications	50	0	0	0	0	0	0	0	50
50-Construction	0	553	0	0	0	0	0	0	553
Total	$50	$566	$0	$0	$0	$0	$0	$0	$616

Project Risk Assessment

N/A.

Enhancement LINK

700692 **Operations Maintenance Facility (OMF) Expanded Parking** **Managed by: Operations**

Design and construct fourteen new parking spaces on the east side of the OMF. Establish and install a suitable amount of electrical vehicle chargers in those spaces for use by agency vehicles only.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$621
2020 TIP:	$621

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$344	$70	$0	$0	$0	$0	$0	$0	$415
South King	171	35	0	0	0	0	0	0	206
Total	$516	$105	$0	$0	$0	$0	$0	$0	$621

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$27	$46	$0	$0	$0	$0	$0	$0	$72
20-Prelim Engineering/Env Review	25	0	0	0	0	0	0	0	25
30-Final Design+Specifications	111	16	0	0	0	0	0	0	127
50-Construction	352	44	0	0	0	0	0	0	396
Total	$516	$105	$0	$0	$0	$0	$0	$0	$621

Project Risk Assessment

N/A.

Enhancement LINK

700693 **Operations Maintenance Facility (OMF) - Renovations** **Managed by: Operations**

Renovate the Link OMF in Seattle, including: resize enclosed offices for more efficient usage of space; create additional workstations; secure the area around the Link Control Center (LCC); and regroup divisions to be co-located for greater efficiency.

Changes to authorized project allocation since 2019: Increased by $3.8 million for increasing OMF electrical capacity and overhaul and relocation of heating, ventilation and air conditioning (HVAC) unit.

Budget year activities: Begin design of electrical equipment, along with initial work on the HVAC.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$7,338
2020 TIP:	$11,105

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,985	$3,777	$1,657	$0	$0	$0	$0	$0	$7,418
South King	986	1,877	823	0	0	0	0	0	3,687
Total	$2,971	$5,654	$2,480	$0	$0	$0	$0	$0	$11,105

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$78	$413	$161	$0	$0	$0	$0	$0	$652
30-Final Design+Specifications	494	464	225	0	0	0	0	0	1,182
50-Construction	2,253	4,413	1,693	0	0	0	0	0	8,358
55-Construction Services	146	365	401	0	0	0	0	0	912
Total	$2,971	$5,654	$2,480	$0	$0	$0	$0	$0	$11,105

Project Risk Assessment

N/A.

Enhancement LINK

700697 **LRV Between Car Barriers** **Managed by: Operations**

Procure and install platform mounted barriers for installation at 21 Link stations.

Federal Transit Authority Regulation 49 CFR 38.85 requires barriers on the platform to prevent visually impaired riders from mistaking the space between light rail vehicles as an open door.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$520
2020 TIP:	$520

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$347	$0	$91	$0	$0	$0	$0	$0	$438
South King	65	0	17	0	0	0	0	0	82
Total	$412	$0	$108	$0	$0	$0	$0	$0	$520

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1	$0	$7	$0	$0	$0	$0	$0	$8
50-Construction	411	0	101	0	0	0	0	0	512
Total	$412	$0	$108	$0	$0	$0	$0	$0	$520

Project Risk Assessment

N/A.

Enhancement LINK

700706 **OMF Energy Efficiency** **Managed by: Operations**

Replace existing Operations and Maintenance Facility (OMF) shop bay lighting (metal halide) with LED fixtures, and replace the direct digital controls on the HVAC system to allow integration with Union Station controls, to increase energy efficiency and reduce operating costs.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	
2019 TIP:	$1,098
2020 TIP:	$1,098

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$700	$0	$33	$0	$0	$0	$0	$0	$733
South King	348	0	17	0	0	0	0	0	365
Total	$1,048	$0	$50	$0	$0	$0	$0	$0	$1,098

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$1,048	$0	$50	$0	$0	$0	$0	$0	$1,098
Total	$1,048	$0	$50	$0	$0	$0	$0	$0	$1,098

Project Risk Assessment

N/A.

Enhancement LINK

700713 **LRV Wash Bay Modifications** **Managed by: Operations**

Install upgrades to the electrical and mechanical equipment components of the ink light rail vehicle (LRV) car wash system at the Link Operations and Maintenance Facility, to provide automatic LRV forehead cleaning and eliminate manual washing.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	
2019 TIP:	$300
2020 TIP:	$300

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$200	$0	$0	$0	$0	$0	$0	$0	$200
South King	100	0	0	0	0	0	0	0	100
Total	$300	$0	$0	$0	$0	$0	$0	$0	$300

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$57	$0	$0	$0	$0	$0	$0	$0	$57
30-Final Design+Specifications	75	0	0	0	0	0	0	0	75
50-Construction	168	0	0	0	0	0	0	0	168
Total	$300	$0	$0	$0	$0	$0	$0	$0	$300

Project Risk Assessment

N/A.

Enhancement LINK

700730 **Operations & Maintenance Facility Light Rail Vehicle Lift** **Managed by: Operations**

Design, procure and install a second lift in the Link Operations and Maintenance Facility. The installation of a second lift in support of operations is required to accommodate scheduled and unscheduled light rail vehicle (LRV) maintenance needs and capacity.

Changes to authorized project allocation since 2019: None.

Budget year activities: Complete installation of both lift hoist and turntable, including testing and commissioning.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$4,898
2019 TIP:	$4,898
2020 TIP:	$4,898

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$3,211	$968	$0	$0	$0	$0	$0	$0	$4,179
South King	553	167	0	0	0	0	0	0	719
Total	$3,764	$1,134	$0	$0	$0	$0	$0	$0	$4,898

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$835	$200	$0	$0	$0	$0	$0	$0	$1,035
20-Prelim Engineering/Env Review	156	0	0	0	0	0	0	0	156
30-Final Design+Specifications	485	100	0	0	0	0	0	0	585
50-Construction	2,280	534	0	0	0	0	0	0	2,814
55-Construction Services	9	300	0	0	0	0	0	0	309
Total	$3,764	$1,134	$0	$0	$0	$0	$0	$0	$4,898

Project Risk Assessment

Constructability of project, given the constraints of having to install the lift in an on-going working environment, creates challenges in both schedule and cost.

Enhancement LINK

700781 **Non-revenue Support Vehicles** **Managed by: Operations**

Purchase and replace maintenance support and specialty support vehicles to improve maintenance efficiencies for the Link light rail system.

Changes to authorized project allocation since 2019: None.

Budget year activities: Establish specifications and procure 6 specialty trucks, 2 transit vans, and 6 sports utility vehicle (SUV).

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$6,149
2020 TIP:	$6,149

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,192	$2,004	$892	$0	$0	$0	$0	$0	$4,089
South King	601	1,010	450	0	0	0	0	0	2,060
Total	$1,793	$3,014	$1,342	$0	$0	$0	$0	$0	$6,149

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
70-Vehicles	$1,793	$3,014	$1,342	$0	$0	$0	$0	$0	$6,149
Total	$1,793	$3,014	$1,342	$0	$0	$0	$0	$0	$6,149

Project Risk Assessment

The growth of the agency and the potential for changing vehicle needs could have budget implications.

Enhancement LINK

700793 **Signage Improvements** **Managed by: DECM**

Install, modify, and upgrade signage at new and existing Link and Sounder stations and ticket vending machine (TVM) locations to improve wayfinding and reflect system expansion.

Changes to authorized project allocation since 2019: Increased by $161.7 thousand for additional 2020 activities to update Sounder customer panels system-wide and reface the exit signage at U Link and Red Line stations.

Budget year activities: Complete Airport wayfinding design, reface exit signage at University Link and Central Link Stations, update Sounder customer panels system-wide, and complete updates to real time Link signage.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,131
2020 TIP:	$1,293

Completion Schedule	
Baseline:	N/A
2019 :	2041
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$2	$1	$1	$0	$0	$0	$0	$0	$4
North King	290	134	88	68	13	3	2	20	618
South King	312	144	95	73	13	3	3	21	663
East King	0	0	0	0	0	0	0	0	1
Pierce	3	1	1	1	0	0	0	0	7
Total	$607	$280	$185	$143	$26	$5	$5	$41	$1,293

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$115	$21	$21	$21	$21	$5	$5	$0	$209
30-Final Design+Specifications	238	9	9	0	0	0	0	38	294
50-Construction	255	250	155	122	5	0	0	3	790
Total	$607	$280	$185	$143	$26	$5	$5	$41	$1,293

Project Risk Assessment

Coordination with government entities and jurisdictions to ensure consistency and continuity of their signage requirements.

Enhancement SOUNDER

300011 **Positive Train Control** **Managed by: DECM**

Integrate command, control, communications, and information systems for controlling passenger train movements with safety, security, precision, and efficiency. These systems will improve railroad safety by significantly reducing the probability of collisions between trains, casualties to railway workers and damage to their equipment, and over speed accidents.

Federal regulations has mandated that positive train control (PTC) be operational on all passenger rail systems by the end of December 2018. Budget displayed beyond 2019 is considered surplus.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$53,054
2019 TIP:	$53,054
2020 TIP:	$53,054

Completion Schedule	
Baseline:	2016
2019 :	2018
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$3,063	$16	$0	$0	$0	$0	$0	$688	$3,767
South King	1,898	10	0	0	0	0	0	426	2,334
Pierce	38,183	195	0	0	0	0	0	8,576	46,953
Total	$43,144	$220	$0	$0	$0	$0	$0	$9,690	$53,054

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1,850	$150	$0	$0	$0	$0	$0	$238	$2,238
30-Final Design+Specifications	226	0	0	0	0	0	0	52	279
35-Third Party	3,900	0	0	0	0	0	0	367	4,267
50-Construction	36,044	45	0	0	0	0	0	2,905	38,995
55-Construction Services	995	25	0	0	0	0	0	3,042	4,062
80-System Testing+Startup	129	0	0	0	0	0	0	1,361	1,490
90-Contingency	0	0	0	0	0	0	0	1,725	1,725
Total	$43,144	$220	$0	$0	$0	$0	$0	$9,690	$53,054

Project Risk Assessment

N/A.

Enhancement SOUNDER

700708 **Customer Emergency Stations** **Managed by: Operations**

Installation of customer emergency stations at the Kent and Auburn parking garages.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$800
2020 TIP:	$800

Completion Schedule	
Baseline:	N/A
2019 :	2018
2020 :	2018

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$243	$0	$557	$0	$0	$0	$0	$0	$800
Total	$243	$0	$557	$0	$0	$0	$0	$0	$800

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$243	$0	$557	$0	$0	$0	$0	$0	$800
Total	$243	$0	$557	$0	$0	$0	$0	$0	$800

Project Risk Assessment

N/A.

Enhancement SOUNDER

700710 Locomotive Inboard Cameras Managed by: Operations

Comply with Federal Railroad Administration rule requiring inboard facing cameras installed in locomotives to monitor the actions of the engineers in handling a train. This project is for a total of 41 pieces of equipment.

Changes to authorized project allocation since 2019: None.

Budget year activities: Install cameras on Sounder locomotives.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$300
2020 TIP:	$300

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$0	$44	$0	$0	$0	$0	$0	$0	$44
South King	0	143	0	0	0	0	0	0	143
Pierce	0	114	0	0	0	0	0	0	114
Total	$0	$300	$0	$0	$0	$0	$0	$0	$300

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$30	$0	$0	$0	$0	$0	$0	$30
30-Final Design+Specifications	0	30	0	0	0	0	0	0	30
50-Construction	0	240	0	0	0	0	0	0	240
Total	$0	$300	$0	$0	$0	$0	$0	$0	$300

Project Risk Assessment

N/A.

Enhancement SOUNDER

700711 Sounder Passenger Emergency Intercom Managed by: Operations

Upgrade communication system on all cars with a Passenger Emergency Intercom (PEI) system that will enable passengers to speak directly to the conductor instead of the engineer.

New FRA rule requires passengers to be able to speak directly with a train crew member. The new Bombardier Cab Cars are coming with a system to meet this new rule. However, this system will only allow passengers to talk directly with the engineer, not the conductor. There is an “Emergency Order” put out by the FRA that prohibits an engineer from being disturbed by a cell phone.

Changes to authorized project allocation since 2019: None.

Budget year activities: Upgrade communication system in Sounder cab cars.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,500
2020 TIP:	$1,500

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$0	$219	$0	$0	$0	$0	$0	$0	$219
South King	0	713	0	0	0	0	0	0	713
Pierce	0	569	0	0	0	0	0	0	569
Total	$0	$1,500	$0	$0	$0	$0	$0	$0	$1,500

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$150	$0	$0	$0	$0	$0	$0	$150
30-Final Design+Specifications	0	300	0	0	0	0	0	0	300
50-Construction	0	1,050	0	0	0	0	0	0	1,050
Total	$0	$1,500	$0	$0	$0	$0	$0	$0	$1,500

Project Risk Assessment

Scheduling adequate resources to the project has resulted in a one year delay of the project. Resource availability continues to be a risk to project schedule.

Enhancement SOUNDER

700724 **Puyallup Station LED Lighting** **Managed by: Operations**

Install energy efficient lighting at Puyallup Station.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$178
2020 TIP:	$178

Completion Schedule	
Baseline:	N/A
2019 :	2018
2020 :	2018

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$151	$0	$27	$0	$0	$0	$0	$0	$178
Total	$151	$0	$27	$0	$0	$0	$0	$0	$178

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$3	$0	$0	$0	$0	$0	$0	$0	$3
50-Construction	148	0	27	0	0	0	0	0	175
Total	$151	$0	$27	$0	$0	$0	$0	$0	$178

Project Risk Assessment

N/A.

Enhancement SOUNDER

700725 **Sumner Station LED Lighting** **Managed by: Operations**

Install energy efficient lighting at Sumner Station. Work will result in receiving a utility incentive based upon the energy reduction achieved and will reduce energy consumption on a ongoing basis.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$134
2020 TIP:	$134

Completion Schedule	
Baseline:	N/A
2019 :	2017
2020 :	2017

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$104	$0	$30	$0	$0	$0	$0	$0	$134
Total	$104	$0	$30	$0	$0	$0	$0	$0	$134

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$3	$0	$0	$0	$0	$0	$0	$0	$3
50-Construction	102	0	30	0	0	0	0	0	131
Total	$104	$0	$30	$0	$0	$0	$0	$0	$134

Project Risk Assessment

N/A.

Enhancement SOUNDER

700726 **Kent Station Platform Lighting** **Managed by: Operations**

Install energy efficient lighting at Kent Station to include upgrades to the platform, surface lots, pedestrian bridge, and bus loop areas.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$236
2020 TIP:	$236

Completion Schedule	
Baseline:	N/A
2019 :	2018
2020 :	2018

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$140	$0	$96	$0	$0	$0	$0	$0	$236
Total	$140	$0	$96	$0	$0	$0	$0	$0	$236

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$140	$0	$96	$0	$0	$0	$0	$0	$236
Total	$140	$0	$96	$0	$0	$0	$0	$0	$236

Project Risk Assessment

N/A.

Enhancement SOUNDER

700727 **Kent Station Parking Lot Paving** **Managed by: Operations**

Design and install paved and landscaped commuter parking for an additional 36 standard spaces, 1 compact space, and 2 Americans with Disabilities Act (ADA) spaces.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$700
2020 TIP:	$700

Completion Schedule	
Baseline:	N/A
2019 :	2018
2020 :	2018

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$76	$0	$624	$0	$0	$0	$0	$0	$700
Total	$76	$0	$624	$0	$0	$0	$0	$0	$700

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$1	$0	$1	$0	$0	$0	$0	$0	$2
20-Prelim Engineering/Env Review	75	0	63	0	0	0	0	0	138
50-Construction	0	0	560	0	0	0	0	0	560
Total	$76	$0	$624	$0	$0	$0	$0	$0	$700

Project Risk Assessment

N/A.

Enhancement

REGIONAL EXPRESS

5X261 **Bus Maintenance Facility** **Managed by: Operations**

Expand Sound Transit's fleet maintenance capacity through funding contributions to facilities managed by third party service providers.

Changes to authorized project allocation since 2019: None.

Budget year activities: None.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$22,033
2020 TIP:	$22,033

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$1,484	$0	$1,998	$0	$0	$0	$0	$0	$3,481
South King	1,042	0	1,403	0	0	0	0	0	2,446
East King	4,451	0	5,993	0	0	0	0	0	10,444
Pierce	2,413	0	3,249	0	0	0	0	0	5,662
Total	$9,390	$0	$12,643	$0	$0	$0	$0	$0	$22,033

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$26	$0	$360	$0	$0	$0	$0	$0	$386
20-Prelim Engineering/Env Review	8	0	133	0	0	0	0	0	141
40-Row Acquisition+Permits	59	0	0	0	0	0	0	0	59
50-Construction	9,297	0	12,150	0	0	0	0	0	21,447
Total	$9,390	$0	$12,643	$0	$0	$0	$0	$0	$22,033

Project Risk Assessment

The schedule is flexible as it relies on partners to submit projects for participation. The schedules dates can change if no projects are planned.

Enhancement

REGIONAL EXPRESS

700689 **Pierce Transit - Global Positioning System Repeater** **Managed by: Operations**

Procure and install radio infrastructure on radio towers owned or used by Pierce Transit necessary to communicate with ST Express buses operated by Pierce Transit outside of Pierce Transit's standard data radio range. This is a shared cost with Pierce Transit.

Changes to authorized project allocation since 2019: None.

Budget Year Activities: None.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,662
2020 TIP:	$1,662

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$0	$0	$1,662	$0	$0	$0	$0	$0	$1,662
Total	$0	$0	$1,662	$0	$0	$0	$0	$0	$1,662

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$0	$0	$1,662	$0	$0	$0	$0	$0	$1,662
Total	$0	$0	$1,662	$0	$0	$0	$0	$0	$1,662

Project Risk Assessment

There is significant schedule risk as Sound Transit is a financial contributor to the project but Pierce Transit will lead the effort and project manage the installation through completion. Sound Transit has no influence into the schedule or installation.

Enhancement | REGIONAL EXPRESS

700690 | **Community Transit - On-Board Communication Upgrade** | **Managed by: Operations**

Purchase and install new on-board communications and data collection components, including base infrastructure, on buses based at Community Transit.

Changes to authorized project allocation since 2019: None.

Budget year activities: Complete installation of on board communications and data collection components.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$2,080
2020 TIP:	$2,080

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$1,047	$1,033	$0	$0	$0	$0	$0	$0	$2,080
Total	$1,047	$1,033	$0	$0	$0	$0	$0	$0	$2,080

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$1,047	$1,033	$0	$0	$0	$0	$0	$0	$2,080
Total	$1,047	$1,033	$0	$0	$0	$0	$0	$0	$2,080

Project Risk Assessment

The upgrade is intended for the current fleet. There will be some schedule risk as each bus will have to be pulled from the working service fleet to have the communication upgrade installed. Bus availability for the install will be important. Intergovernmental agreement is in progress.

Enhancement | OTHER

600080 | **Bike Parking Program** | **Managed by: PEPD**

Provide bicycle parking at Sound Transit facilities in response to demand or for maintenance, replacement or upgrade needs.

Changes to authorized project allocation since 2019: None.

Budget year activities: Bike lockers installation at Bonney Lake Park and Ride, Edmonds Station, Issaquah Transit Center, Mercer Island Park and Ride, Mukilteo Station, Tukwila International Blvd station.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$9,700
2020 TIP:	$9,700

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,568	$1,535	$919	$1,349	$1,146	$0	$0	$0	$6,517
East King	766	749	449	659	560	0	0	0	3,183
Total	$2,334	$2,284	$1,367	$2,008	$1,706	$0	$0	$0	$9,700

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$0	$0	$67	$108	$312	$0	$0	$0	$488
10-Agency Administration	104	100	100	100	96	0	0	0	500
30-Final Design+Specifications	0	0	100	100	300	0	0	0	500
50-Construction	2,231	2,184	1,100	1,700	998	0	0	0	8,212
Total	$2,334	$2,284	$1,367	$2,008	$1,706	$0	$0	$0	$9,700

Project Risk Assessment

This project is focused on addressing localized high demand for bike lockers in specific areas. The technology is provided by one vendor and is dependent on the vendor's ability to provide and support the equipment and the software.

Enhancement OTHER

600084 Passenger Information Management System Managed by: ITS

Design and implement a digital information system for sharing passenger usage data to create a better user experience and a more efficient multi-modal transit system.

Changes to authorized project allocation since 2019: None.

Budget year activities: Establish preliminary engineering milestones, develop and refine project scope and determine program interface requirements with various agency affected systems.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$49,576
2020 TIP:	$49,576

Completion Schedule	
Baseline:	N/A
2019 :	2025
2020 :	2025

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$5,072	$8,958	$9,051	$6,447	$11,051	$8,446	$551	$0	$49,576
Total	$5,072	$8,958	$9,051	$6,447	$11,051	$8,446	$551	$0	$49,576

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$3,050	$551	$551	$551	$551	$551	$551	$0	$6,355
20-Prelim Engineering/Env Review	1,062	0	0	0	0	0	0	0	1,062
30-Final Design+Specifications	960	907	0	0	0	0	0	0	1,867
50-Construction	0	7,500	8,500	5,896	10,500	7,896	0	0	40,292
Total	$5,072	$8,958	$9,051	$6,447	$11,051	$8,446	$551	$0	$49,576

Project Risk Assessment

The project is just beginning to enter a discovery phase of the project to define the breadth of impact this program will have across 4 modes - Link, Sounder, Bus Rapid Transit and Regional Express. The scope of the project and estimate of cost to deliver the undefined scope can create cost volatility due to the uncertainty. The program will be following a phase gate process to ensure key decision makers are involved during the scoping and preliminary engineering processes.

Enhancement OTHER

600085 SODO/MLK Hazard Mitigation Managed by: DECM

Various at-grade crossings in 2016 and early 2017 met the threshold for Unacceptable Hazardous Conditions. As a result, three Sound Transit departments (Design Engineering & Construction Management, Safety and Quality Assurance, and Operations) and Seattle's Department of Transportation (SDOT) partnered to assess the performance of at-grade crossings system wide and identify opportunities for enhancements and implement remedies.

Changes to authorized project allocation since 2019: None.

Budget year activities: Address illegal left turns along Martin Luther King (MLK), upgrade pedestrian warning signs, install second train warning devices at busway and MLK stations. Install close circuit television (CCTV) cameras at Royal Brougham, Holgate, Lander, Othello, and Henderson.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$3,136
2020 TIP:	$3,136

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,036	$610	$1,490	$0	$0	$0	$0	$0	$3,136
Total	$1,036	$610	$1,490	$0	$0	$0	$0	$0	$3,136

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$201	$100	$199	$0	$0	$0	$0	$0	$500
30-Final Design+Specifications	0	0	331	0	0	0	0	0	331
50-Construction	835	510	935	0	0	0	0	0	2,280
55-Construction Services	0	0	25	0	0	0	0	0	25
Total	$1,036	$610	$1,490	$0	$0	$0	$0	$0	$3,136

Project Risk Assessment

N/A.

Enhancement OTHER

600133 **Parking Management Program** **Managed by: PEPD**

Implement parking management for Sound Transit-owned parking facilities. Parking management includes charging for parking (daily charges and monthly permitting); collecting and disseminating parking capacity information; and validating that drivers parking car at our facilities are using transit after they park.

Changes to authorized project allocation since 2019: New program for $13.7 million to manage parking at ST owned facilities.

Budget year activities: Permits migration core delivery; Payment Management System installation core delivery; Parking Oversight management; Parking Enforcement HW install and maintenance, enforcement and vehicle; Good2G0 optional delivery, and Customer information fabrication and installation.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$13,692

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$0	$1,926	$1,555	$2,336	$4,291	$3,586	$0	$0	$13,692
Total	$0	$1,926	$1,555	$2,336	$4,291	$3,586	$0	$0	$13,692

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$0	$350	$788	$1,225	$1,575	$1,575	$0	$0	$5,513
20-Prelim Engineering/Env Review	0	1,576	467	811	2,216	1,511	0	0	6,580
35-Third Party	0	0	0	0	200	200	0	0	400
50-Construction	0	0	300	300	300	300	0	0	1,200
Total	$0	$1,926	$1,555	$2,336	$4,291	$3,586	$0	$0	$13,692

Project Risk Assessment

N/A.

Enhancement OTHER

600145 **Design Criteria Manual Update** **Managed by: DECM**

Coordinate, administer and update multiple standard documents to include the design criteria manual (DCM), engineering procedures (EPs), standard specifications and many other documents.

Changes to authorized project allocation since 2019: New project of $300 thousand to support the update of the design criteria manual.

Budget year activities: Procure a consultant to serve as a subject matter expert related to standards and technical studies, drafting support, research, and architectural renderings.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$200

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$0	$200	$0	$0	$0	$0	$0	$0	$200
Total	$0	$200	$0	$0	$0	$0	$0	$0	$200

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$200	$0	$0	$0	$0	$0	$0	$200
Total	$0	$200	$0	$0	$0	$0	$0	$0	$200

Project Risk Assessment

N/A.

Enhancement OTHER

700665 **Video Management System Upgrade** **Managed by: Operations**

Upgrade the existing Video Management System currently being used in the Security Operations Center to monitor and investigate incidents at all Sounder, Tacoma Link, ST Express Bus and Sound Transit office locations. Install video analytics software to maximize viewer attention to potential incidents.

Changes to authorized project allocation since 2019: Increased by $980 thousand for video analytics software installation.

Budget year activities: Installation of the video analytics software that will sit on top of the existing video management upgrade project.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$900
2020 TIP:	$1,880

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$900	$390	$590	$0	$0	$0	$0	$0	$1,880
Total	$900	$390	$590	$0	$0	$0	$0	$0	$1,880

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$900	$390	$590	$0	$0	$0	$0	$0	$1,880
Total	$900	$390	$590	$0	$0	$0	$0	$0	$1,880

Project Risk Assessment

N/A.

Enhancement OTHER

700685 **Everett Station Security Improvements** **Managed by: Operations**

Procure and install 40 CCTV Cameras and associated recording equipment. Install 14 CES (Customer Emergency Stations) in areas around the station.

Changes to authorized project allocation since 2019: None.

Budget year activities: None.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$289
2020 TIP:	$289

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$289	$0	$0	$0	$0	$0	$0	$0	$289
Total	$289	$0	$0	$0	$0	$0	$0	$0	$289

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$289	$0	$0	$0	$0	$0	$0	$0	$289
Total	$289	$0	$0	$0	$0	$0	$0	$0	$289

Project Risk Assessment

N/A.

Enhancement OTHER

700686 **Security Radio System** **Managed by: Operations**

Procure, upgrade and enhance Sound Transit 's security radio systems and equipment for expansion of security services

Changes to authorized project allocation since 2019: None.

Budget year activities: Complete installation of equipment.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,253
2020 TIP:	$1,253

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$245	$1,008	$0	$0	$0	$0	$0	$0	$1,253
Total	$245	$1,008	$0	$0	$0	$0	$0	$0	$1,253

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$245	$1,008	$0	$0	$0	$0	$0	$0	$1,253
Total	$245	$1,008	$0	$0	$0	$0	$0	$0	$1,253

Project Risk Assessment

Some risk exists given the need for compatibility to our systems affecting schedule. Financial risk is minimized because the work is largely covered through a federal grant.

Enhancement OTHER

700687 **Security Operations Center - Video Monitoring Improvements** **Managed by: Operations**

Install approximately 10 additional monitors in the security operations center, associated hardware and video processing equipment. Remove old equipment as necessary.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$241
2020 TIP:	$241

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$241	$0	$0	$0	$0	$0	$0	$0	$241
Total	$241	$0	$0	$0	$0	$0	$0	$0	$241

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$241	$0	$0	$0	$0	$0	$0	$0	$241
Total	$241	$0	$0	$0	$0	$0	$0	$0	$241

Project Risk Assessment

N/A.

Enhancement OTHER

700688 **LED Lighting Program** **Managed by: Operations**

Upgrade existing lighting fixtures at selected ST owned stations to Light Emitting Diode (LED) based fixtures to reduce annual energy costs and maintenance.

Stations include; University of Washington, Tukwila International Blvd, Airport, Mt. Baker, Columbia City, Othello, Rainer Beach link light rail stations, Kent Sounder station and Mountlake Terrace Regional Express station.

Changes to authorized project allocation since 2019: None.

Budget year activities: Lighting retrofit at Kent Garage and upgrade of lighting fixtures at Mountlake Terrace.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,500
2020 TIP:	$1,500

Completion Schedule	
Baseline:	N/A
2019 :	2021
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$409	$245	$846	$0	$0	$0	$0	$0	$1,500
Total	$409	$245	$846	$0	$0	$0	$0	$0	$1,500

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$20	$30	$0	$0	$0	$0	$0	$50
50-Construction	409	225	816	0	0	0	0	0	1,450
Total	$409	$245	$846	$0	$0	$0	$0	$0	$1,500

Project Risk Assessment

Although the current installations have been successful, the addition of scope has a risk of influencing final budget and extending the schedule to accommodate scope changes.

Enhancement OTHER

700723 **Downtown Seattle & Regional Mobility Improvements** **Managed by: Operations**

Financial contribute to the One Center City Plan partnership for a series of mitigation improvements, including street improvements in downtown Seattle, to mitigate impacts to bus operations as buses transition from the Downtown Seattle Transit Tunnel (DSTT) to surface streets to accommodate increased light rail activity in the tunnel.

Changes to authorized project allocation since 2019: None.

Budget year activities: Contribute to capital improvements per agreements with the City of Seattle and King County Metro.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	
2019 TIP:	$12,334
2020 TIP:	$12,334

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$9,007	$3,327	$0	$0	$0	$0	$0	$0	$12,334
Total	$9,007	$3,327	$0	$0	$0	$0	$0	$0	$12,334

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$43	$0	$0	$0	$0	$0	$0	$0	$43
30-Final Design+Specifications	107	57	0	0	0	0	0	0	164
35-Third Party	8,497	3,170	0	0	0	0	0	0	11,667
50-Construction	360	100	0	0	0	0	0	0	460
Total	$9,007	$3,327	$0	$0	$0	$0	$0	$0	$12,334

Project Risk Assessment

N/A.

Enhancement OTHER

700736 **Union Station Garden Level Remodel** **Managed by: Operations**

Renovate Union Station's Garden Level: convert cubicle space from 8X8 to 6X8 configuration, add 7 enclosed offices, relocate 3 offices, create a new mailroom, install new carpet, purchase and install 132 cubicles, and install new data cabling to support additional staff and consultants.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,854
2020 TIP:	$1,854

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$1,715	$0	$139	$0	$0	$0	$0	$0	$1,854
Total	$1,715	$0	$139	$0	$0	$0	$0	$0	$1,854

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$3	$0	$0	$0	$0	$0	$0	$0	$3
30-Final Design+Specifications	21	0	0	0	0	0	0	0	21
50-Construction	1,691	0	139	0	0	0	0	0	1,831
Total	$1,715	$0	$139	$0	$0	$0	$0	$0	$1,854

Project Risk Assessment

N/A.

2020 Cashflow by Budget Approval

(in thousands)

State of Good Repair

ALL MODES

Project Number and Name		Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Preliminary Engineering										
400116	DSTT Capital Improvements	$5,350	$24,160	$22,360	$22,360	$22,170	$0	$0	$0	$96,400
700657	Wheel Truing Machine	960	1,395	1,608	0	0	0	0	0	3,963
	Subtotal	6,310	25,555	23,968	22,360	22,170	0	0	0	100,363
Operating										
400046	Convention Place Development Systems Retrofit	1,277	2,214	242	0	0	0	0	0	3,732
600033	Link CCTV System Upgrade	2,816	278	0	0	0	0	0	0	3,094
700652	OT Virtual System Hardware Upgrade	0	600	0	0	0	0	0	0	600
700655	Kinkisharyo LRV Systems Upgrade	0	3,300	8,800	3,500	2,200	0	0	0	17,800
700682	Tacoma Link HVAC and Building Systems Upgrade	30	370	0	0	0	0	0	0	400
700695	Access Control Card Upgrade	1,496	768	0	0	0	0	0	0	2,264
700704	Link Radio Upgrade	986	0	14	0	0	0	0	0	1,000
700705	Link Bridge Repairs	0	200	350	0	0	0	0	0	550
700718	Tacoma Link Light Rail Vehicle Overhaul	248	386	97	0	0	0	0	0	731
700728	Link Station Tile Replacement	0	846	614	0	0	0	0	0	1,460
700769	Light Rail Vehicle Overhaul	2,092	950	1,958	0	0	0	0	0	5,000
7X356	Tacoma Dome Station	2,210	0	1,342	0	0	0	0	0	3,553
	Subtotal	11,156	9,911	13,417	3,500	2,200	0	0	0	40,183
Program										
700677	Link Light Rail Vehicle Overhaul	5,127	2,000	2,000	2,000	2,000	1,615	0	0	14,742
700770	Sounder Vehicle Overhaul Program	24,830	6,692	6,323	3,877	3,585	901	0	0	46,209
700771	Station Midlife Refurbishment Program	2,515	2,239	1,164	205	0	0	0	0	6,123
7X701	ST Express Fleet Replacement	148,791	26,099	14,379	0	0	0	0	0	189,269
7X740	Small Works Program	4,565	1,798	1,617	1,244	1,244	1,595	0	0	12,064
870100	Information Technology (IT) Infrastructure	3,599	1,730	2,209	1,046	1,127	2,687	2,525	31,919	46,843
870101	IT Transit Systems	444	78	298	626	320	586	312	3,241	5,905
	Subtotal	189,872	40,636	27,990	8,999	8,277	7,383	2,837	35,160	321,155
	Total	$207,338	$76,102	$65,375	$34,859	$32,647	$7,383	$2,837	$35,160	$461,701

2020 Cashflow by Subarea

(in thousands)

State of Good Repair

ALL MODES

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
1 - Snohomish	$30,182	$5,744	$3,607	$693	$653	$331	$0	$0	$41,210
2 - North King	13,151	7,560	5,742	2,300	2,360	3,310	1,871	23,646	59,939
3 - South King	35,328	9,600	7,672	3,288	3,020	1,942	654	8,274	69,778
4 - East King	69,311	12,347	6,921	236	236	303	0	0	89,356
5 - Pierce	52,610	11,317	8,366	1,856	1,688	911	0	0	76,750
6 - Systemwide	6,754	29,533	33,067	26,486	24,690	586	312	3,241	124,668
Total	$207,338	$76,102	$65,375	$34,859	$32,647	$7,383	$2,837	$35,160	$461,701

2020 Cashflow by Phase

(in thousands)

Phase # and Description	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$6,359	$8,822	$9,058	$6,082	$5,585	$2,515	$0	$0	$38,422
09-Admin Capital	3,580	1,130	609	296	552	797	725	1,995	9,684
10-Agency Administration	1,129	1,644	1,684	1,060	945	810	810	9,219	17,301
20-Prelim Engineering/Env Review	164	0	0	0	0	0	0	0	164
30-Final Design+Specifications	1,054	3,548	1,632	1,600	1,500	0	0	0	9,335
35-Third Party	0	0	150	0	0	0	0	0	150
50-Construction	32,277	29,321	26,918	22,321	21,865	3,261	1,302	23,946	161,210
55-Construction Services	60	372	90	0	0	0	0	0	522
70-Vehicles	162,715	31,265	25,234	3,500	2,200	0	0	0	224,913
Total	$207,338	$76,102	$65,375	$34,859	$32,647	$7,383	$2,837	$35,160	$461,701

State of Good Repair — LINK

400046 — Convention Place Development Systems Retrofit — Managed by: DECM

Replace existing emergency generator and install electrical distribution equipment that is necessary for the operation and integration of the Pine Street facility with the University Link and the Downtown Seattle Transit Tunnel (DSTT).

Changes to authorized project allocation since 2019: Increased by $732 thousand to cover increase in contractor's cost estimate to complete the work.

Budget year activities: Install electrical distribution equipment in the Convention Place/Pine Street area.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	
2019 TIP:	$3,000
2020 TIP:	$3,732

Completion Schedule	
Baseline:	N/A
2019 :	2021
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,277	$2,214	$242	$0	$0	$0	$0	$0	$3,732
Total	$1,277	$2,214	$242	$0	$0	$0	$0	$0	$3,732

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$279	$196	$131	$0	$0	$0	$0	$0	$606
30-Final Design+Specifications	37	0	0	0	0	0	0	0	37
50-Construction	901	1,796	61	0	0	0	0	0	2,757
55-Construction Services	60	222	50	0	0	0	0	0	332
Total	$1,277	$2,214	$242	$0	$0	$0	$0	$0	$3,732

Project Risk Assessment

Coordination with Link Operations and King County Metro to avoid impacts to existing DSTT operations will be challenging and may have schedule and cost impacts.

State of Good Repair — LINK

400116 — DSTT Capital Improvements — Managed by: EXE

Assess and identify facility issues in the Downtown Seattle Transit Tunnel that negatively affect the customer experience, are not compliant with current building codes, or present safety and security hazards. Design and perform improvements to address identified issues.

Changes to authorized project allocation since 2019: Increase by $86.4 million for tunnel improvements.

Budget year activities: Address the vertical conveyance systems, lighting retrofits, and ingress and egress improvements.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$10,000
2020 TIP:	$96,400

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$5,350	$24,160	$22,360	$22,360	$22,170	$0	$0	$0	$96,400
Total	$5,350	$24,160	$22,360	$22,360	$22,170	$0	$0	$0	$96,400

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$50	$760	$760	$760	$670	$0	$0	$0	$3,000
30-Final Design+Specifications	300	3,400	1,600	1,600	1,500	0	0	0	8,400
50-Construction	5,000	20,000	20,000	20,000	20,000	0	0	0	85,000
Total	$5,350	$24,160	$22,360	$22,360	$22,170	$0	$0	$0	$96,400

Project Risk Assessment

Project risk is medium because the DSTT condition assessment was received in December 2018 and a refined scope and schedule has yet to be completed.

State of Good Repair — LINK

600033 — Link CCTV System Upgrade — Managed by: Operations

Upgrade existing Link light rail Closed-Circuit Television (CCTV) NiceVision system at 16 stations and Link Operations and Maintenance Facility with digital cameras to be compatible with the new equipment installed for University Link and South 200th Link extensions.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project closeout activities.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$3,094
2020 TIP:	$3,094

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,884	$186	$0	$0	$0	$0	$0	$0	$2,070
South King	932	92	0	0	0	0	0	0	1,024
Total	$2,816	$278	$0	$0	$0	$0	$0	$0	$3,094

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$20	$0	$0	$0	$0	$0	$0	$0	$20
30-Final Design+Specifications	50	0	0	0	0	0	0	0	50
50-Construction	2,746	278	0	0	0	0	0	0	3,024
Total	$2,816	$278	$0	$0	$0	$0	$0	$0	$3,094

Project Risk Assessment

Completion of the project in 2019 requires all stations can be scheduled for installation of a large volume of cameras and integration into the agency CCTV system.

State of Good Repair — LINK

700652 — OT Virtual System Hardware Upgrade — Managed by: Operations

Perform lifecycle replacement and upgrade of server hardware and support systems serving as the information systems platform for running communication and control (SCADA) virtual servers.

Changes to authorized project allocation since 2019: New project of $600 thousand for information technology hardware upgrades in support of the Link SCADA program.

Budget year activities: procure consultant and equipment in support of replacement and upgrade of existing software and hardware platforms used for running communication and virtual servers.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$600

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$0	$600	$0	$0	$0	$0	$0	$0	$600
Total	$0	$600	$0	$0	$0	$0	$0	$0	$600

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$0	$600	$0	$0	$0	$0	$0	$0	$600
Total	$0	$600	$0	$0	$0	$0	$0	$0	$600

Project Risk Assessment

State of Good Repair — LINK

700655 — **Kinkisharyo LRV Systems Upgrade** — **Managed by: Operations**

Replace and update onboard communications, LRV control systems and install automatic passenger counters in all Kinkisharyo LRV vehicles.

Changes to authorized project allocation since 2019: New project of $17.8 million for communications systems upgrades to Kinkasharyo light rail vehicles (LRV) for a four year project from 2020 until 2023.

Budget year activities: Each LRV will have onboard communication and control systems upgraded in order to maintain the fleet in in a good state of repair.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$0
2020 TIP:	$17,800

Completion Schedule	
Baseline:	N/A
2019 :	N/A
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$0	$3,300	$8,800	$3,500	$2,200	$0	$0	$0	$17,800
Total	$0	$3,300	$8,800	$3,500	$2,200	$0	$0	$0	$17,800

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
70-Vehicles	$0	$3,300	$8,800	$3,500	$2,200	$0	$0	$0	$17,800
Total	$0	$3,300	$8,800	$3,500	$2,200	$0	$0	$0	$17,800

Project Risk Assessment

N/A.

State of Good Repair — LINK

700657 — **Wheel Truing Machine** — **Managed by: Operations**

Procure and take deliver of a portable wheel truing machine for light rail vehicles. Remove and replace existing fixed wheel truing machine at the Operations and Maintenance Facility (OMF) - Central.

Changes to authorized project allocation since 2019: Increased by $3 million to replace the wheel truing machine at the OMF-Central which has reached the end of its useful life.

Budget year activities: Establish specifications, commence procurement process and award contract to replace existing wheel truing machine.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$960
2020 TIP:	$3,963

Completion Schedule	
Baseline:	N/A
2019 :	2021
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$960	$1,395	$1,608	$0	$0	$0	$0	$0	$3,963
Total	$960	$1,395	$1,608	$0	$0	$0	$0	$0	$3,963

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$960	$1,395	$1,608	$0	$0	$0	$0	$0	$3,963
Total	$960	$1,395	$1,608	$0	$0	$0	$0	$0	$3,963

Project Risk Assessment

N/A.

State of Good Repair LINK

700677 **Link Light Rail Vehicle Overhaul** **Managed by: Operations**

Plan and implement a light rail vehicle overhaul program to perform required mid-life maintenance and component overhauls required to keep vehicles in a state of good repair and achieve full life expectancy.

Changes to authorized project allocation since 2019: None.

Budget year activities: Overhaul such as Brakes, C-Truck Axle, Pantograph, and Coupler assembly.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$14,742
2020 TIP:	$14,742

Completion Schedule	
Baseline:	N/A
2019 :	2022
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$3,430	$1,338	$1,338	$1,338	$1,338	$1,080	$0	$0	$9,862
South King	1,697	662	662	662	662	534	0	0	4,880
Total	$5,127	$2,000	$2,000	$2,000	$2,000	$1,615	$0	$0	$14,742

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$4,889	$2,000	$2,000	$2,000	$2,000	$1,615	$0	$0	$14,503
70-Vehicles	239	0	0	0	0	0	0	0	239
Total	$5,127	$2,000	$2,000	$2,000	$2,000	$1,615	$0	$0	$14,742

Project Risk Assessment

There are both schedule and budget risks: project delays could compromise light rail vehicles state of good repair and availability for use and have an affect on the budget requirements to fund the program.

State of Good Repair LINK

700682 **Tacoma Link HVAC and Building Systems Upgrade** **Managed by: Operations**

Coordinate, replace and upgrade of the original heating, ventilation and air-conditioning (HVAC) systems and building controls at the Tacoma Operations and Maintenance Facility (OMF) during the construction of the Hilltop Tacoma Link Extension project.

Changes to authorized project allocation since 2019: None.

Budget year activities: Upgrade the heating, ventilation, and air conditioning (HVAC) and building systems.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$400
2020 TIP:	$400

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$30	$370	$0	$0	$0	$0	$0	$0	$400
Total	$30	$370	$0	$0	$0	$0	$0	$0	$400

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
30-Final Design+Specifications	$30	$0	$0	$0	$0	$0	$0	$0	$30
50-Construction	0	370	0	0	0	0	0	0	370
Total	$30	$370	$0	$0	$0	$0	$0	$0	$400

Project Risk Assessment

Coordination with the Tacoma Link Expansion project is critical to obtaining an integrated, fully functional building control and HVAC system for the new combined facility.

State of Good Repair — LINK

700695 — **Access Control Card Upgrade** — **Managed by: Operations**

Upgrade the existing access control system that manages the secure access to Sound Transit Link facilities achieving a single access control platform for all of the agency's Link facilities.

Changes to authorized project allocation since 2019: None.

Budget year activities: Complete upgrade of access control card system.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$2,264
2020 TIP:	$2,264

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,151	$591	$0	$0	$0	$0	$0	$0	$1,741
South King	345	177	0	0	0	0	0	0	523
Total	$1,496	$768	$0	$0	$0	$0	$0	$0	$2,264

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$1,496	$768	$0	$0	$0	$0	$0	$0	$2,264
Total	$1,496	$768	$0	$0	$0	$0	$0	$0	$2,264

Project Risk Assessment

N/A.

State of Good Repair — LINK

700704 — **Link Radio Upgrade** — **Managed by: Operations**

Install upgraded Distributed Antenna System (DAS) in the Downtown Seattle Transit Tunnel and the Beacon Hill Tunnel.

Changes to authorized project allocation since 2019: None.

Budget year activities: Project is complete.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	
2019 TIP:	$1,000
2020 TIP:	$1,000

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2019

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$659	$0	$9	$0	$0	$0	$0	$0	$668
South King	327	0	5	0	0	0	0	0	332
Total	$986	$0	$14	$0	$0	$0	$0	$0	$1,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$66	$0	$14	$0	$0	$0	$0	$0	$80
20-Prelim Engineering/Env Review	100	0	0	0	0	0	0	0	100
30-Final Design+Specifications	120	0	0	0	0	0	0	0	120
50-Construction	700	0	0	0	0	0	0	0	700
Total	$986	$0	$14	$0	$0	$0	$0	$0	$1,000

Project Risk Assessment

N/A.

700705 **Link Bridge Repairs** **Managed by: Operations**

Repair bridge structures within the Tukwila Freeway Route and E-3 Busway segments of the Link light rail alignment to correct areas of deterioration.

Changes to authorized project allocation since 2019: None.

Budget year activities: Perform bridge bearing repairs and other maintenance works.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	
2019 TIP:	$550
2020 TIP:	$550

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$0	$200	$350	$0	$0	$0	$0	$0	$550
Total	$0	$200	$350	$0	$0	$0	$0	$0	$550

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$20	$30	$0	$0	$0	$0	$0	$50
30-Final Design+Specifications	0	50	0	0	0	0	0	0	50
50-Construction	0	130	320	0	0	0	0	0	450
Total	$0	$200	$350	$0	$0	$0	$0	$0	$550

Project Risk Assessment

There is a limited repair window to perform repairs without impacting light rail operations. Effective schedule and efficient execution of repairs is required.

700718 **Tacoma Link Light Rail Vehicle Overhaul** **Managed by: Operations**

Maintain, preserve, and extend the life of the Tacoma Link fleet of four light rail vehicles.

Repair, replace and overhaul traction motors and trucks, including wheel assemblies and gear boxes for the light rail vehicles per the manufacturer's 375,000 mile overhaul guidelines.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue overhaul of 4 Tacoma Link light rail vehicle traction motors and trucks.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$731
2020 TIP:	$731

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2020

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$248	$386	$97	$0	$0	$0	$0	$0	$731
Total	$248	$386	$97	$0	$0	$0	$0	$0	$731

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
70-Vehicles	$248	$386	$97	$0	$0	$0	$0	$0	$731
Total	$248	$386	$97	$0	$0	$0	$0	$0	$731

Project Risk Assessment

There is a small risk the length of time to perform the overhaul activities could have schedule impacts.

700728 **Link Station Tile Replacement** **Managed by: Operations**

Demolition and reinstallation of tile at five Link light rail stations: Stadium, Sodo, Columbia City, Othello, and Rainier Beach.

Changes to authorized project allocation since 2019: Increased by $1 million to accommodate cost increase for tile replacement in 3 Link stations.

Budget year activities: Construction work at Stadium Station during DSTT closure for single tracking, and wayfinding tile replacement work at other stations.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$435
2020 TIP:	$1,460

Completion Schedule	
Baseline:	N/A
2019 :	2019
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$0	$846	$614	$0	$0	$0	$0	$0	$1,460
Total	$0	$846	$614	$0	$0	$0	$0	$0	$1,460

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$0	$30	$20	$0	$0	$0	$0	$0	$50
50-Construction	0	766	554	0	0	0	0	0	1,320
55-Construction Services	0	50	40	0	0	0	0	0	90
Total	$0	$846	$614	$0	$0	$0	$0	$0	$1,460

Project Risk Assessment

N/A.

700769 **Light Rail Vehicle Overhaul** **Managed by: DECM**

Complete repairs of the gear units and traction motors on light rail vehicles (LRVs), and purchase materials, equipment, services, and labor necessary to complete repairs.

This work is considered warranty work to be reimbursed by the manufacturer. Acceptance of repairs performed are being testing and under reliability review.

Changes to authorized project allocation since 2019: None.

Budget year activities: Complete testing of spare traction power motors and gear boxes.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$5,000
2020 TIP:	$5,000

Completion Schedule	
Baseline:	N/A
2019 :	2020
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$1,399	$636	$1,310	$0	$0	$0	$0	$0	$3,345
South King	692	314	648	0	0	0	0	0	1,655
Total	$2,092	$950	$1,958	$0	$0	$0	$0	$0	$5,000

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
70-Vehicles	$2,092	$950	$1,958	$0	$0	$0	$0	$0	$5,000
Total	$2,092	$950	$1,958	$0	$0	$0	$0	$0	$5,000

Project Risk Assessment

Budget risk remains high given that no agreement regarding the warranty coverage on repairs has been reached between manufacturer, supplier and Sound Transit.

State of Good Repair | SOUNDER

700770 | **Sounder Vehicle Overhaul Program** | **Managed by: Operations**

Maintain, preserve, and extend the life of Sounder locomotives, cab cars, and coach cars fleet.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue locomotive overhaul, including overhauling HVAC, HEP controllers, HEP fans and radiators, car doors, and trucks. Begin coach car overhauls including new car painting, carpet, seats, lighting and lavatories.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$46,209
2020 TIP:	$46,209

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$3,402	$917	$866	$531	$491	$123	$0	$0	$6,331
South King	13,011	3,507	3,313	2,032	1,879	472	0	0	24,213
Pierce	8,417	2,269	2,143	1,314	1,215	305	0	0	15,665
Total	$24,830	$6,692	$6,323	$3,877	$3,585	$901	$0	$0	$46,209

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$1,420	$6,162	$6,323	$3,877	$3,585	$901	$0	$0	$22,269
50-Construction	12,254	0	0	0	0	0	0	0	12,254
70-Vehicles	11,156	530	0	0	0	0	0	0	11,686
Total	$24,830	$6,692	$6,323	$3,877	$3,585	$901	$0	$0	$46,209

Project Risk Assessment

Multiple Sounder vehicles being overhauled or under going major repairs continue to run the risk of cost overruns or schedule delays.

State of Good Repair | REGIONAL EXPRESS

700771 | **Station Midlife Refurbishment Program** | **Managed by: Operations**

Provide rehabilitation and mid-life maintenance for Sound Transit facilities that have been in service for fifteen years or longer.

Changes to authorized project allocation since 2019: Increased by $2.5 million for repairs and replacement of sidewalk, parking garage fire alarm system, 9 bus shelters at Kent Station, and CCTV at Issaquah and Lakewood Transit Centers.

Budget year activities: Replace sidewalk, parking garage fire alarm system, and 9 bus shelters at Kent Station. Replace CCTV in Issaquah and Lakewood Transit Centers.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$3,574
2020 TIP:	$6,123

Completion Schedule	
Baseline:	N/A
2019 :	2022
2020 :	2022

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
South King	$1,678	$1,494	$776	$137	$0	$0	$0	$0	$4,084
Pierce	837	746	388	68	0	0	0	0	2,039
Total	$2,515	$2,239	$1,164	$205	$0	$0	$0	$0	$6,123

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
01-Operation+Maintenance	$50	$660	$735	$205	$0	$0	$0	$0	$1,650
10-Agency Administration	122	32	18	0	0	0	0	0	172
30-Final Design+Specifications	224	28	0	0	0	0	0	0	252
50-Construction	2,119	1,419	411	0	0	0	0	0	3,949
55-Construction Services	0	100	0	0	0	0	0	0	100
Total	$2,515	$2,239	$1,164	$205	$0	$0	$0	$0	$6,123

Project Risk Assessment

Undefined scope of work at the various station locations could affect both the budget and schedule.

State of Good Repair | REGIONAL EXPRESS

7X701 | **ST Express Fleet Replacement** | **Managed by: Operations**

Procure replacement buses for the ST Express fleet.

Current Assumptions: FTA guidelines indicate that buses are to be replaced no earlier than either 12 years of service or 500,000 miles. Due to the unique service characteristics of the ST Express fleet, Sound Transit buses typically reach 500,000 miles after only 10 years of operations yet Sound Transit often keeps buses for several years past the minimal deadline. Replacement decisions are informed by specific fleet performance in consultation with our operating partner agencies. During the period from 2017-2021 150 buses will be replaced. The fleet size as January 2019 is 318.

Changes to authorized project allocation since 2019: None.

Budget year activities: Delivery, testing and commissioning of 25 New Flyer sixty-foot buses.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$189,269
2020 TIP:	$189,269

Completion Schedule	
Baseline:	N/A
2019 :	2021
2020 :	2021

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$26,187	$4,593	$2,531	$0	$0	$0	$0	$0	$33,311
South King	15,028	2,636	1,452	0	0	0	0	0	19,116
East King	68,444	12,005	6,614	0	0	0	0	0	87,064
Pierce	39,132	6,864	3,782	0	0	0	0	0	49,778
Total	$148,791	$26,099	$14,379	$0	$0	$0	$0	$0	$189,269

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$47	$0	$0	$0	$0	$0	$0	$0	$47
70-Vehicles	148,745	26,099	14,379	0	0	0	0	0	189,222
Total	$148,791	$26,099	$14,379	$0	$0	$0	$0	$0	$189,269

Project Risk Assessment

Budget risk is a concern as the cost estimates and vehicle types are annually reviewed as replacements are identified and the agency adopts on-board technologies to be included in future replacements.

Bus Base capacity issues with our service partners, particularly KCM, is a risk to the timing of bus delivery.

State of Good Repair | OTHER

7X356 | **Tacoma Dome Station** | **Managed by: Operations**

Provide financial support to address major maintenance requirement at Tacoma Dome Station per agreement with Pierce Transit.

Changes to authorized project allocation since 2019: None.

Budget year activities: None.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$3,553
2020 TIP:	$3,553

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2023

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Pierce	$2,210	$0	$1,342	$0	$0	$0	$0	$0	$3,553
Total	$2,210	$0	$1,342	$0	$0	$0	$0	$0	$3,553

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$2,210	$0	$1,342	$0	$0	$0	$0	$0	$3,553
Total	$2,210	$0	$1,342	$0	$0	$0	$0	$0	$3,553

Project Risk Assessment

The agency has agreed to fund a proportional share at completion. The budget represents ST's share of the cost estimate. It is possible that the agency would be responsible for the same share of cost overruns.

State of Good Repair | OTHER

7X740 | **Small Works Program** | **Managed by: Operations**

Projects completed under the small works program include modification/repairs of operating facilities and systems with an estimated total cost of less than $350,000 per project. The budget for this program is based on number of sites maintained, age of facilities, and amount of use.

Changes to authorized project allocation since 2019: None.

Budget year activities: Continue work in progress from 2019, establish 2020 project list and deliver projects using traditional procurement methods, job order contracting (JOC), and internal resources.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$12,064
2020 TIP:	$12,064

Completion Schedule	
Baseline:	N/A
2019 :	2024
2020 :	2024

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$593	$234	$210	$162	$162	$207	$0	$0	$1,568
North King	685	270	243	187	187	239	0	0	1,810
South King	685	270	243	187	187	239	0	0	1,810
East King	867	342	307	236	236	303	0	0	2,292
Pierce	1,735	683	615	473	473	606	0	0	4,585
Total	$4,565	$1,798	$1,617	$1,244	$1,244	$1,595	$0	$0	$12,064

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$571	$6	$12	$0	$0	$0	$0	$0	$589
20-Prelim Engineering/Env Review	64	0	0	0	0	0	0	0	64
30-Final Design+Specifications	294	70	32	0	0	0	0	0	396
35-Third Party	0	0	150	0	0	0	0	0	150
50-Construction	3,400	1,722	1,423	1,244	1,244	1,595	0	0	10,629
70-Vehicles	236	0	0	0	0	0	0	0	236
Total	$4,565	$1,798	$1,617	$1,244	$1,244	$1,595	$0	$0	$12,064

Project Risk Assessment

Project risks are minimal, however, the volume of small works eligible projects and the limits of internal resources could impact the delivery of project requests. Given recent spending, age and growth of the Agency asset base the out years (2019-2023) will require additional financial resources to meet the demand of small works qualified projects.

State of Good Repair | OTHER

870100 | **Information Technology (IT) Infrastructure** | **Managed by: ITS**

Provide lifecycle maintenance of the IT infrastructure across all agency and revenue systems including but not limited to: servers, storage area networks, networking equipment, backend for customer-facing systems (i.e. Video Messaging System) and other computer-based infrastructure, plus enhancements and maintenance for IT network and data security, including firewalls and other related technology systems.

This project encompasses the infrastructure systems for the entirety of the agency datacenters and network and the backend infrastructure systems for the Link light rail systems, including SCADA. The project also includes integration and upgrades of legacy hardware/software at Link light rail stations and control centers with upcoming future light rail expansion.

Changes to authorized project allocation since 2019: None.

Budget year activities: Perform ongoing state of good repair and lifecycle maintenance of agency and operational system backend technology infrastructure, which includes servers, storage area networks, networking equipment, and other computer-based infrastructure; IT SCADA backend security, and LRV wireless network.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$46,843
2020 TIP:	$46,843

Completion Schedule	
Baseline:	N/A
2019 :	2025
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
North King	$2,666	$1,281	$1,636	$775	$835	$1,991	$1,871	$23,646	$34,701
South King	933	448	573	271	292	697	654	8,274	12,142
Total	$3,599	$1,730	$2,209	$1,046	$1,127	$2,687	$2,525	$31,919	$46,843

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
09-Admin Capital	$3,580	$1,130	$609	$296	$552	$797	$725	$1,995	$9,684
10-Agency Administration	19	600	700	300	275	810	810	9,219	12,733
50-Construction	0	0	900	450	300	1,080	990	20,706	24,426
Total	$3,599	$1,730	$2,209	$1,046	$1,127	$2,687	$2,525	$31,919	$46,843

Project Risk Assessment

Potential for risk of increased cost as system expands and integration and support require more resources to meet system compliance standards.

State of Good Repair | OTHER

870101 | **IT Transit Systems** | **Managed by: ITS**

Maintain, upgrade and replace multiple computer and technology-based systems at Sounder stations and ST Express transit centers to keep them safe, secure, and functional for our customers.

Systems maintained include: Sounder Stations & Transit Centers - closed circuit television access control and customer emergency stations; Sounder - passenger information systems, automated passenger counters and variable message signage.

Changes to authorized project allocation since 2019: None.

Budget year activities: Activities will be focused on projects supporting the transit security group and modal operations. Anticipate some small capital purchases of more than $5,000 per item as needed.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$5,905
2020 TIP:	$5,905

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2027

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$444	$78	$298	$626	$320	$586	$312	$3,241	$5,905
Total	$444	$78	$298	$626	$320	$586	$312	$3,241	$5,905

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
50-Construction	$444	$78	$298	$626	$320	$586	$312	$3,241	$5,905
Total	$444	$78	$298	$626	$320	$586	$312	$3,241	$5,905

Project Risk Assessment

Information technology is ever changing and could adversely affect both the cost of the equipment and the availability of the equipment and technology.

2020 Cashflow by Budget Approval

(in thousands)

Administrative

ALL MODES

Project Number and Name		Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Program										
0X002	Agency Administration Operating	$542,033	$112,520	$128,790	$131,620	$133,675	$133,760	$135,361	$0	$1,317,759
600025	Environmental Mitigation, Monitoring & Maintenance	691	100	130	130	130	130	160	0	1,471
802000	Administrative Capital	14,356	6,452	3,743	4,343	4,398	3,964	3,964	21,066	62,284
803800	Information Technology Program	26,920	8,243	5,325	5,725	3,708	4,695	5,496	53,422	113,536
	Subtotal	584,000	127,315	137,988	141,818	141,910	142,549	144,981	74,488	1,495,050
	Total	$584,000	$127,315	$137,988	$141,818	$141,910	$142,549	$144,981	$74,488	$1,495,050

2020 Cashflow by Subarea

(in thousands)

Administrative

ALL MODES

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
1 - Snohomish	$121	$18	$23	$23	$23	$23	$28	$0	$257
3 - South King	428	62	81	81	81	81	99	0	912
4 - East King	40	6	8	8	8	8	9	0	86
5 - Pierce	101	15	19	19	19	19	24	0	216
6 - Systemwide	583,309	127,215	137,858	141,688	141,780	142,419	144,821	74,488	1,493,579
Total	$584,000	$127,315	$137,988	$141,818	$141,910	$142,549	$144,981	$74,488	$1,495,050

2020 Cashflow by Phase

(in thousands)

Phase # and Description	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
09-Admin Capital	$35,961	$12,595	$7,424	$9,172	$7,901	$8,394	$9,253	$73,412	$164,113
10-Agency Administration	545,943	114,380	130,195	132,302	133,675	133,760	135,361	0	1,325,616
20-Prelim Engineering/Env Review	2,096	340	369	344	334	394	367	1,076	5,321
Total	$584,000	$127,315	$137,988	$141,818	$141,910	$142,549	$144,981	$74,488	$1,495,050

Administrative OTHER

0X002 Agency Administration Operating Managed by: FIN

Funds administrative overhead expenses that are charged to transit operations, projects as well as overhead expenses that are not allocated to either capital projects or transit operations. Overhead expenses allocated to projects are included in the capitalized cost of the resulting assets. Unallocated overhead expenses are included in general and administrative expenses for the agency.

The agency uses a cost allocation plan approved by the Federal Transit Administration. (Use of this approved model makes the majority of indirect project expenses eligible for federal grant funding.)

Changes to authorized project allocation since 2019: Increased by $178 million for anticipated agency administrative operating costs up to 2025.

Budget year activities: Fund administrative overhead.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,139,488
2020 TIP:	$1,317,759

Completion Schedule	
Baseline:	N/A
2019 :	2025
2020 :	2025

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	$791,918
2019 Cost Estimate:	$1,139,488
2020 Cost Estimate:	$1,317,759

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$542,033	$112,520	$128,790	$131,620	$133,675	$133,760	$135,361	$0	$1,317,759
Total	$542,033	$112,520	$128,790	$131,620	$133,675	$133,760	$135,361	$0	$1,317,759

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
10-Agency Administration	$542,033	$112,520	$128,790	$131,620	$133,675	$133,760	$135,361	$0	$1,317,759
Total	$542,033	$112,520	$128,790	$131,620	$133,675	$133,760	$135,361	$0	$1,317,759

Project Risk Assessment

N/A.

Administrative OTHER

600025 Environmental Mitigation, Monitoring & Maintenance Managed by: PEPD

Monitor and maintain post-construction environmental mitigation including wetland hydrology, plant establishment, and other site features. Duration depends upon permit conditions and may be 10 years or may last for the life of the property.

Changes to authorized project allocation since 2019: None.

Budget year activities: Monitor and maintain mitigation maintenance activities at Tacoma Trestle, Tukwila, and McKinley Park transit centers.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$1,471
2020 TIP:	$1,471

Completion Schedule	
Baseline:	N/A
2019 :	2030
2020 :	2025

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Snohomish	$121	$18	$23	$23	$23	$23	$28	$0	$257
South King	428	62	81	81	81	81	99	0	912
East King	40	6	8	8	8	8	9	0	86
Pierce	101	15	19	19	19	19	24	0	216
Total	$691	$100	$130	$130	$130	$130	$160	$0	$1,471

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
20-Prelim Engineering/Env Review	$691	$100	$130	$130	$130	$130	$160	$0	$1,471
Total	$691	$100	$130	$130	$130	$130	$160	$0	$1,471

Project Risk Assessment

N/A.

Administrative OTHER

802000 Administrative Capital Managed by: FIN

Funds capital expenditures for administrative assets that support agency staff, including administrative facilities, non-revenue administrative fleet, office equipment, space planning, and furnishings.

Changes to authorized project allocation since 2019: None.

Budget year activities: Procure and commission into the administrative fleet 14 electric cars, 1 pick-up truck, 4 SUVs, 4 vans, begin year two of a three year replacement of 96 variable air exchangers and three HVAC compressor at Union Station, and procure furnishings to accommodate agency growth.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$62,284
2020 TIP:	$62,284

Completion Schedule	
Baseline:	N/A
2019 :	2041
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$14,356	$6,452	$3,743	$4,343	$4,398	$3,964	$3,964	$21,066	$62,284
Total	$14,356	$6,452	$3,743	$4,343	$4,398	$3,964	$3,964	$21,066	$62,284

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
09-Admin Capital	$14,337	$6,352	$3,743	$4,343	$4,398	$3,964	$3,964	$21,066	$62,165
10-Agency Administration	19	100	0	0	0	0	0	0	119
Total	$14,356	$6,452	$3,743	$4,343	$4,398	$3,964	$3,964	$21,066	$62,284

Project Risk Assessment

The accumulation of changes over time, to staffing, space, and growth of administrative facilities could outpace the funding of this project.

Administrative OTHER

803800 Information Technology Program Managed by: ITS

Support agencywide hardware and software technology, develop and implement technology solutions to improve administrative efficiency through 2041.

Changes to authorized project allocation since 2019: None.

Budget year activities: Implement Right of Way tracking software, Operating Performance Reporting and Information Security software. Continue SharePoint/Office 360 Upgrade and other strategic projects as identified.

Authorized Project Allocation To Date (YOE $000s)	
Baseline:	$0
2019 TIP:	$113,536
2020 TIP:	$113,536

Completion Schedule	
Baseline:	N/A
2019 :	2023
2020 :	2041

Financial Plan Project Estimate (2019 $000s)	
Voter-Approved Cost Estimate:	N/A
2019 Cost Estimate:	N/A
2020 Cost Estimate:	N/A

Cashflow (YOE $000s)

Subarea	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
Systemwide	$26,920	$8,243	$5,325	$5,725	$3,708	$4,695	$5,496	$53,422	$113,536
Total	$26,920	$8,243	$5,325	$5,725	$3,708	$4,695	$5,496	$53,422	$113,536

Phase	Life to Date	2020	2021	2022	2023	2024	2025	Future	Total
09-Admin Capital	$21,624	$6,243	$3,681	$4,830	$3,504	$4,431	$5,289	$52,347	$101,948
10-Agency Administration	3,891	1,760	1,405	682	0	0	0	0	7,737
20-Prelim Engineering/Env Review	1,405	240	239	214	204	264	207	1,076	3,850
Total	$26,920	$8,243	$5,325	$5,725	$3,708	$4,695	$5,496	$53,422	$113,536

Project Risk Assessment

Future year forecasts reflect initial planning estimates so costs are subject to change. Schedules are dependent on staff capacity and the specific application or approach selected.

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