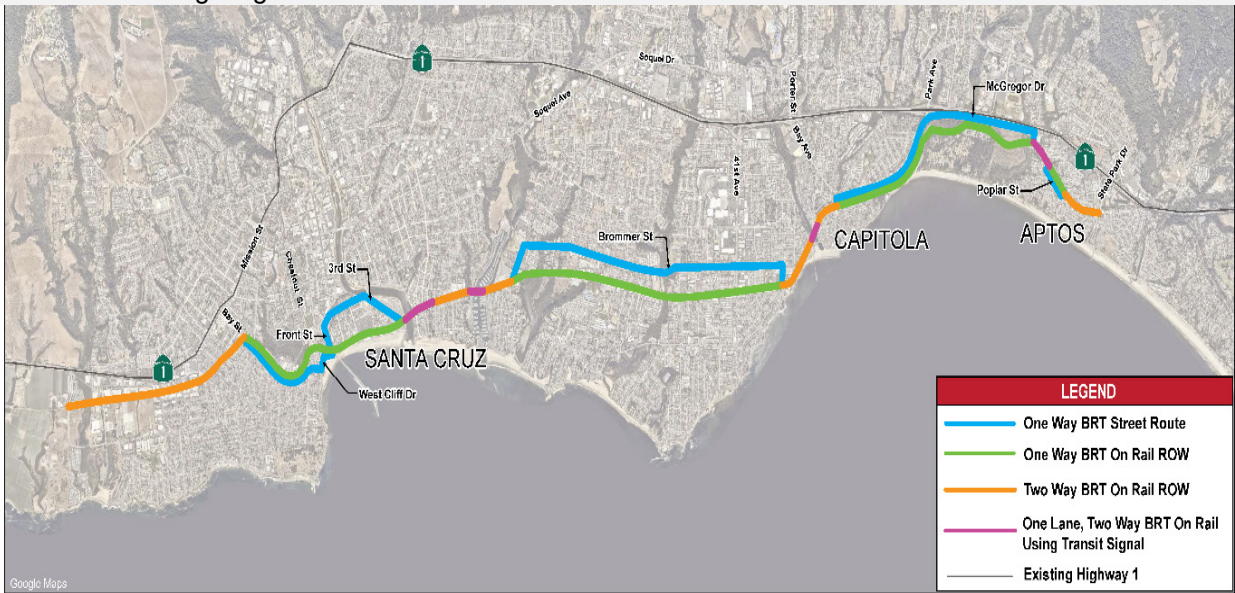


Project	Table B-10: Passenger Rail Service		
Limits	Natural Bridges Drive to Pajaro Station		
Description	Passenger rail transit service provided between the Westside of Santa Cruz and Pajaro Station just south of the Santa Cruz County border in Monterey County. The costs for a diesel multiple unit (DMU) vehicle train service and the cost to electrify rail service are both evaluated.		
Scope	Replacement of all rail on portions of the line between Santa Cruz with continuously welded rail using good-quality second-hand rail. Replacement of 2/3 of rail ties, improve or replace turnouts and switches. Implement new signal and positive train control system to monitor and control train movements. Install new active warning devices at nineteen crossings and quiet zones at all thirty-three public at grade crossings. Construct stations with platforms, ticketing machines, parking, bicycle racks and lockers and shelter similar to a bus shelter. Implement recommended improvements to structures as identified in 2012 JL Patterson Report. Provide forty-two hours of passenger rail transit revenue hours per day with thirty-minute headway during the weekday from 6am to 9pm and weekends serving ten primary stations (Westside Santa Cruz, Bay Street/California, Downtown Santa Cruz, Seabright, 17th, 41st, Monterey Avenue, Aptos Village and Downtown Watsonville in Santa Cruz County) and one station at Pajaro in Monterey County. The Passenger Rail Service project adds 163 new weekday and 102.5 new weekend revenue hours of bus transit service connecting to rail stations.		
CAPITAL COSTS			
Track			\$30,700,000
Signal			\$16,400,000
Train Control			\$60,400,000
Structures ¹			\$5,100,000
Stations / Maintenance Facility			\$27,800,000
Rail Vehicles			\$62,500,000
Soft Costs (30%)			\$60,900,000
Contingency (30%)			\$60,900,000
TOTAL PROJECT COSTS- CAPITAL ²			\$324,700,000 ²
<p>¹ The cost estimates for local rail transit provided for the UCS assume the cost for structure repairs identified in the JL Patterson Structures Assessment, 2012. An evaluation of structures within the rail right-of-way is underway and recommendations for repair/replacement of structures will be available in 2019. The anticipated use of the structures varies for each scenario identified in the UCS, and understanding the future use of the corridor will inform the recommendations for repairs/replacements of structures.</p> <p>² The Total Project Cost for Electric Multiple Unit (EMU) passenger rail service between Santa Cruz and Pajaro is estimated to cost a total of \$474.4 million. If passenger rail service were to be implemented in the future, additional analysis would be performed to assess the type of vehicle that would be most beneficial based on the latest technological improvements.</p>			
OPERATION & MAINTENANCE COSTS- RAIL TRANSIT			
	Daily Revenue Hours	Operating Cost per Hour	Annual Operating Cost
Rail Transit Service (weekday)	42	\$573	\$6,100,000

Rail Transit Service (weekend and holiday)	26	\$573	\$1,700,000
Vehicle O&M – Soft Costs (40%)			\$3,100,000
Vehicle O&M – Contingency (20%)			\$2,200,000
		Scenario B	Scenario E
Maintenance of Rail Right-of-Way		\$2,200,000	\$1,100,000
Maintenance - Contingency (15%)		\$300,000	\$100,000
TOTAL PROJECT COST-OPERATIONS (RAIL)		\$15,600,000	\$14,300,000
Operating electrical multiple unit vehicles is estimated to cost \$13.2 million annually.			
CAPITAL COSTS – NEW LOCAL BUS TRANSIT CONNECTION TO RAIL			
Bus Vehicle (30% Contingency)			\$11,700,000
TOTAL PROJECT COST – CAPITAL (BUS)			\$11,700,000
OPERATION COSTS- NEW LOCAL BUS TRANSIT CONNECTION TO RAIL			
	New Daily Revenue Hours	Operating Cost per Hour	Annual Operating Cost
Route 55 - Increase Service Weekday	16	\$200	\$800,000
Route 55 - Increase Service Weekend	20	\$200	\$440,000
Route 66 - Realign & increase service Weekday	15	\$200	\$765,000
Route 68 - Increase service Weekday	15	\$200	\$765,000
Route 19 - Increase service Weekday	12	\$200	\$612,000
Route 22 - Increase service School Term Weekday	15	\$200	\$510,000
Route 22 - Add year-round service Weekday	30	\$200	\$510,000
Route 22 - Increase service Weekend	30	\$200	\$660,000
Route 57- Increase service Weekday	45	\$200	\$2,300,000
Route 57 - increase service Weekend	45	\$200	\$990,000
Route 65 - Increase service Weekday	15	\$200	\$765,000
Route 65 - Increase service Weekend	7.5	\$200	\$165,000
Contingency (30%)			\$2,800,000
TOTAL PROJECT COST-OPERATIONS (BUS)			\$12,100,000

Project	Table B-11: Excursion Rail Service		
Limits	Davenport to Santa Cruz		
Description	Excursion rail service between Santa Cruz and Davenport seasonally on weekends and holidays.		
Scope	Adds new excursion passenger service on weekend and holidays between Santa Cruz and Davenport with four round trips per day. Rail transit cars used for passenger rail service from Santa Cruz to Pajaro will also be used for excursion rail service. Positive Train Control is not assumed for this section of track.		
CAPITAL COSTS			
Track			\$4,800,000
Signal			\$1,500,000
Train Control			N/A
Structures ¹			\$721,000
Stations / Maintenance Facility			\$2,500,000
Rail Vehicles			N/A
Soft Costs (30%)			\$2,900,000
Contingency (30%)			\$2,900,000
TOTAL PROJECT COSTS- CAPITAL ²			\$15,300,000 ¹
<p>¹ An evaluation of structures within the rail right-of-way is underway and recommendations for repair/replacement of structures will be available in 2019. The anticipated use of the structures varies for each scenario identified in the UCS, and understanding the future use of the corridor will inform the recommendations for repairs/replacements of structures.</p> <p>² The Total Project Cost for Electric Multiple Unit (EMU) excursion rail service between Santa Cruz and Davenport is estimated to cost a total of \$75.1 million.</p>			
OPERATION & MAINTENANCE COSTS- EXCURSION RAIL TRANSIT			
	New Daily Revenue Hours	Operating Cost per Hour	Annual Operating Cost
Rail Transit Service (weekday)	0	\$490	\$-
Rail Transit Service (weekend and holiday)	16	\$490	\$78,000
Vehicle O&M – Soft Costs (38%)			\$30,000
Vehicle O&M – Contingency (20%)			\$22,000
		Scenario B	Scenario E
Maintenance Rail Right-of-Way		\$400,000	\$200,000
Maintenance Rail Right-of-Way – Contingency (15%)		\$20,000	\$10,000
TOTAL PROJECT COST-OPERATIONS		\$600,000	\$400,000

Project	Table B-12: Bus Rapid Transit Watsonville to Santa Cruz on Rail Right of Way with portions of route on parallel roadways		
Limits	Watsonville Transit Center to Shaffer Rd on West side of Santa Cruz		
Description	Two-directional bus rapid transit between Watsonville Transit Center and Shaffer Rd on Westside of Santa Cruz utilizing a combination of the rail right-of-way, Highway 1, and local streets. BRT on rail right of way from State Park Dr. in Aptos to Shaffer Rd on west side of Santa Cruz with portions of route on parallel street network.		
Scope	BRT buses would travel on Highway 1 between Watsonville Transit Center and State Park Drive. Buses utilize the rail ROW between State Park Dr. and Shaffer Rd for two directional travel where feasible or one-directional travel on rail ROW with reverse direction on parallel local streets. Bus Rapid Transit is on 8.5 miles of the rail ROW with a combination of two-way (2.4 miles) and one-way (6.1 miles) with reverse direction on parallel local streets. Service on bridges is one way and transit signals are utilized on the rail bridges to hold one direction of travel while transit in the other direction travels through. Buses are prioritized at at-grade roadway crossings. Bus Rapid Transit service will be branded and transit service and vehicle amenities are designed to be equivalent to those provided by rail transit to the extent possible. Provide 122 hours of new weekday bus transit service and 60 hours of new weekend bus transit service between Santa Cruz and Watsonville at fifteen-minute frequency's during peak periods to stations on the rail ROW and on parallel streets. Includes signal, on-street improvements and communication/lighting/electrical.		
			
CAPITAL COSTS			
Earthwork and Pavement			\$18,000,000
Drainage			\$5,000,000
Retaining Wall & Fencing			\$15,000,000
Rail Removal			\$2,000,000
Platforms & Stations			\$25,000,000
Signals, Signal Priority & Que Jumps			\$17,000,000
Amenities			\$11,000,000
Contingency (50%) ¹			\$58,800,000

Structures ²			\$4,000,000
Bus Vehicles			\$16,800,000
Other ³			\$25,000,000
Soft Costs (30%)			\$67,100,000
TOTAL PROJECT COSTS- CONSTRUCTION			\$265,000,000

¹ The costs for the trail projects and the bus rapid transit on the rail right-of-way have contingency costs of 50% due to unknown costs associated with the handling and disposal of excavated soil from the rail right-of-way that may contain contaminants and would be required to be addressed.

² An evaluation of structures within the rail right-of-way is underway and recommendations for repair/replacement of structures will be available in 2019. The anticipated use of the structures varies for each scenario identified in the UCS, and understanding the future use of the corridor will inform the recommendations for repairs/replacements of structures.

³ Includes traffic control, mobilization, supplemental work, state furnished materials, and structure mobilization.

OPERATION & MAINTENANCE COSTS

	New Daily Revenue Hours	Operating Cost per Hour	Annual Operating Cost
Route 66 - Increase service Weekday	17	\$200	\$900,000
Route 68 - Increase service Weekday	12	\$200	\$600,000
BRT (all stops peak) Weekday	30	\$200	\$1,500,000
BRT (express) Weekday	18	\$200	\$900,000
BRT (all stops off-peak) Weekday	45	\$200	\$2,300,000
BRT all stops Weekend	60	\$200	\$1,300,000
Maintenance	8.5 miles	\$25,000	\$200,000
Contingency (30%)			\$2,300,000
TOTAL PROJECT COST OPERATION & MAINTENANCE			\$10,100,000

Project	Table B-13: Trail Only		
Limits	Davenport to Pajaro Station		
Description	The trail only option on the rail right of way is 26 feet wide in urban areas where there are no grade constraints, 16 feet wide in urban areas with grade constraints, 14 feet wide in rural areas. In urban areas, defined as Shaffer Rd in the City of Santa Cruz to San Andreas Rd at Manresa State Beach and Lee Rd in in the City Watsonville to Pajaro Station. All trail widths referenced include 2ft buffers that could be paved or unpaved. Over rail bridges, the trail is assumed to be 12ft.		
Scope	The total trail length is 30.2 miles with 8.6 miles of 26 foot wide trail, 5.4 miles of 16 foot wide trail, 14.0 miles of 14 foot wide trail, 1.4 miles of 12 foot wide bridges, and 0.7 miles parallel to roadway. All trail widths referenced are inclusive of 2ft buffers that could be paved or unpaved. For the purposes of the UCS, bicyclists are considered separate from pedestrians using pavement markings where the trail is 16 feet or wider. Trail is located on the rail ROW for it's entirely although there are two sections of the ROW that are along the street network. Assumptions made here are for the purpose of evaluation in the UCS. Pavement widths and treatments for separation of bicycle and pedestrians would be determined during future design phases. Construction of a trail only option involves removal of the tracks and ties and establishment of an aggregate base layers. Rail ballast is the support base for the railroad ties and rails and is meant to allow water to properly drain away from the rails and ties. Rail ballast, as it lies in its current application, would not be a suitable aggregate base layer for pavement because it does not meet the gradation and compaction requirements.		
CAPITAL COSTS			
Earthwork and Pavement			\$35,800,000
Drainage			\$2,000,000
Fencing			\$600,000
Rail Removal (includes salvage value)			\$8,300,000
Trail Crossing and Roadway Treatments			\$5,600,000
Landscaping			\$1,500,000
Amenities			\$7,100,000
Other			\$18,700,000
Contingency (50%) ¹			\$39,000,000
Bridge Structures (with 10% contingency and mobilization) ²			\$15,500,000
Soft Costs (39%)			\$46,400,000
cost to reverse policy (pay back and loss of funding, staff resources to implement policy reversal) ³			\$41,000,000
TOTAL PROJECT COSTS- CONSTRUCTION			\$221,500,000 ⁴
¹ The costs for the trail projects and the bus rapid transit on the rail right-of-way have contingency costs of 50% due to unknown costs associated with the handling and disposal of excavated soil from the rail right-of-way that may contain contaminants and would be required to be addressed.			
² An evaluation of structures on the rail corridor is underway and recommendations for repair/replacement of structures will be available in 2019. The anticipated use of the structures varies for each scenario identified in			

the UCS, and understanding the future use of the corridor will inform the recommendations for repairs/replacements of structures.

³ Cost to Reverse Policy:

- \$11 million repayment to California Transportation Commission (CTC)
- \$10 million from State Transportation Improvement Program, Public Transportation Account for additional rail right-of-way purchase costs and bridge improvement costs that are required to be used for transit
- \$7.8 million escalation of property value of rail right-of-way to repay CTC
- \$10.6 million loss of funds from Central Federal Lands for Segment 5 of Monterey Bay Sanctuary Scenic Trail due to inability to meet deadline of construction start in 2020
- \$1.6 million staff costs for working with federal and state agencies to reverse use of rail right-of-way

⁴ Trail Only with alternative alignment onto San Andreas Rd/Beach St between San Andreas Rd and Lee Road is estimated to cost \$198 million. The reduction in cost from the Trail Only on the rail ROW between San Andreas Rd and Walker Street is associated with less cost for earthwork, pavement and drainage work.

MAINTENANCE COSTS

	Miles	Cost per Mile	Annual Maintenance Cost
Trail	30.2	\$20,000	\$604,000
Roadway ¹	0.7	\$-	\$-
TOTAL PROJECT COST- OPERATIONS		\$20,000	\$604,000

¹Facility maintenance for local roads are allocated by local jurisdictions.

Project	Table B-14: Trail Next to Rail
Limits	Davenport to Pajaro Station
Description	The trail next to rail on the rail right of way is 12 feet wide except for Segment 7 on the west side of Santa Cruz and Segment 5 along north coast from Wilder Ranch to Davenport, trail is 16 feet wide.
Scope	The project length is a total of 30.5 miles with 19.3 miles of 12 foot wide trail, 8.9 miles of 16 foot wide trail and 2.4 miles parallel to roadway. All trail widths referenced are inclusive of 2ft buffers that could be paved or unpaved. The trail is routed onto Nova Street between 41st Street and 47th Street and sharrows will be marked on the neighborhood street. The trail is routed onto Cliff Dr/Stockton Ave/Capitola Ave/Monterey Avenue and back onto Rail ROW south of Park Ave. Protected bike lanes will be provided where feasible and sharrows on narrower roadways. For the purposes of the UCS, the trail is assumed to be a "multi-use" trail shared between bicyclists and pedestrians. Pavement widths and treatments for separation of bicycle and pedestrians would be determined during future design phases.

CAPITAL COSTS

Earthwork and Pavement ¹			\$16,000,000
Drainage			\$2,000,000
Retaining Wall (estimated at 26,000 ft) & Fencing			\$31,400,000
Rail Removal			\$-
Trail Crossing and Roadway Treatments			\$4,900,000
Landscaping			\$1,300,000
Amenities			\$7,300,000
Other			\$17,600,000
Contingency (50%) ²			\$40,400,000
Structures (with 10% contingency and mobilization) ³			\$60,200,000
Soft Costs (39%)			\$67,200,000
Monterey Bay Scenic Sanctuary Trail Cost- Segment 5 and Segment 7 costs			\$34,000,000
TOTAL PROJECT COSTS- CONSTRUCTION			\$283,000,000 ⁴

¹ Earthwork costs on this line do not include the cost of earth work for Segment 5 and 7 for which more refined cost estimates are available, Costs for Segment 5 and Segment 7 are included in the total cost for Trail Next to Rail and shown as a separate line item,.

² The costs for the trail projects and the bus rapid transit on the rail right-of-way have contingency costs of 50% due to unknown costs associated with the handling and disposal of excavated soil from the rail right-of-way that may contain contaminants and would be required to be addressed.

³ An evaluation of structures on the rail corridor is underway and recommendations for repair/replacement of structures will be available in 2019. The anticipated use of the structures varies for each scenario identified in

the UCS, and understanding the future use of the corridor will inform the recommendations for repairs/replacements of structures.

⁴ Trail Next to Rail with alternative alignment onto San Andreas Rd/Beach St between San Andreas Rd and Lee Road is estimated to cost \$211 million. The reduction in cost from the Trail Next to Rail in the rail ROW between San Andreas Rd and Walker Street is associated with less cost for earthwork, pavement, drainage, retaining walls, structures, and amenities.

MAINTENANCE COSTS			
	Miles	Cost per Mile	Annual Maintenance Cost
Trail	30.2	\$20,000	\$604,000
Roadway ¹	2.4	\$-	\$-
TOTAL PROJECT COST- MAINTENANCE		\$20,000	\$604,000

¹ Facility maintenance for improvements to local roads are allocated by local jurisdictions.

Project	Table B-15: Trail Next to BRT		
Limits	Davenport to Pajaro Station		
Description	Trail next to Bus Rapid Transit (BRT) between State Park Dr and Shaffer Rd with remaining sections Trail Only from Shaffer to Davenport and from State Park Dr to Pajaro Station. The trail next to BRT is 12 feet wide in areas next to BRT and where trail only, the trail is 26 feet wide in urban areas where there are no grade constraints, 16 feet wide in urban areas with grade constraints, and 14 feet wide in rural areas.		
Scope	The project length is a total of 30.5 miles with 1.9 miles of 26 foot wide, 2.2 miles of 16 foot wide, 14.0 miles of 14 foot wide, 10.8 miles of 12 foot wide trail, and 1.6 miles parallel to roadway. All trail widths referenced are inclusive of 2ft buffers that could be paved or unpaved. For the purposes of the UCS, where the trail is 16 feet wide or wider, bicyclists are considered separate from pedestrians using pavement markings. Assumptions made here are for the purpose of evaluation in the UCS. Pavement widths and treatments for separation of bicycle and pedestrians would be determined during future design phases.		
CAPITAL COSTS			
Earthwork and Pavement			\$31,000,000
Drainage			\$4,000,000
Retaining Wall (estimated at 13,000 total ft) & Fencing			\$15,400,000
Rail Removal (includes salvage value)			\$5,400,000
Trail Crossing and Roadway Treatments			\$2,900,000
Landscaping			\$1,400,000
Amenities			\$7,900,000
Other			\$19,200,000
Contingency (50%) ¹			\$43,600,000
Structures (with 10% contingency and 10% mobilization) ²			\$27,800,000
Soft Costs (39%) ³			\$58,800,000
cost to reverse policy (pay back and loss of funding, staff resources to implement policy reversal)-			\$41,000,000
TOTAL PROJECT COSTS- CAPITAL			\$258,400,000 ⁴
¹ The costs for the trail projects and the bus rapid transit on the rail right-of-way have contingency costs of 50% due to unknown costs associated with the handling and disposal of excavated soil from the rail right-of-way that may contain contaminants and would be required to be addressed.			
² An evaluation of structures on the rail corridor is underway and recommendations for repair/replacement of structures will be available in 2019. The anticipated use of the structures varies for each scenario identified in the UCS, and understanding the future use of the corridor will inform the recommendations for repairs/replacements of structures.			

³ The costs for the trail projects and the bus rapid transit on the rail right-of-way have contingency costs of 50% due to unknown costs associated with the handling and disposal of excavated soil from the rail right-of-way that may contain contaminants and would be required to be addressed.

⁴Trail next to Bus Rapid Transit with alternative alignment onto San Andreas Rd/Beach St between San Andreas Rd and Lee Road is estimated to cost \$238 million. The reduction in cost from the Trail Only on the rail ROW between San Andreas Rd and Walker Street is associated with less cost for earthwork, pavement and drainage.

MAINTENANCE COSTS			
	Miles	Cost per Mile	Annual Maintenance Cost
Trail	30.2	\$20,000	\$604,000
Roadway ¹	1.6	\$-	\$-
TOTAL PROJECT COST- MAINTENANCE		\$20,000	\$604,000

¹ Facility maintenance for improvements to local roads are allocated by local jurisdictions.

APPENDIX C – UCS POTENTIAL FUNDING SOURCES 2018-2035

UCS POTENTIAL FUNDING SOURCES: 2018-2035

FUNDING SOURCES	17-year total (in thousands)	Highway Improvements	Intersection Improvements	Bicycle and Pedestrian Improvements	Rail Capital	Bus Capital ²	Bus Transit Service on Roadways O&M ³	Rail or Bus Transit O&M	Education and Enforcement	Trail	DESCRIPTION
LOCAL SOURCES											
City Revenues Used for Transportation Projects	\$16,000	X	X	X						X	15% of City of SC Measure H funds allocated to transportation in 2040 RTP. 10% of SC, Wats, County developer fees identified for transportation in the 2040 RTP. 5% of SC, Wats, Co general funds identified for transportation in the 2040 RTP. San Lorenzo bridge over Highway 1 not to receive more than City of SC share.
Non-Profit, Member Fees, Private Donations	\$8,000								X	X	Revenues from non- profit/private sources (i.e. Land Trust or other non-profits)
Measure D: 2016 Transportation Sales Tax ¹	\$114,000	X	X	X					X	X	100% of Active Transportation Program category funds. 5% of Neighborhood Projects category funds. 6% of Highway Improvement category funds for Traveler Information and Transportation Demand Management.
AB2766	\$2,000		X	X	X	X	X	X		X	50% of the funds estimated to be awarded to Santa Cruz County.
SB1 Road Maintenance and Rehabilitation Account- Local Gas Tax	\$29,000	X	X	X		X				X	25% of gas tax revenues allocated to local jurisdictions.

FUNDING SOURCES	17-year total (in thousands)	Highway Improvements	Intersection Improvements	Bicycle and Pedestrian Improvements	Rail Capital	Bus Capital ²	Bus Transit Service on Roadways O&M ³	Rail or Bus Transit Right-of-Way O&M	Education and Enforcement	Trail	DESCRIPTION
STATE SOURCES											
SB1 State Transit Assistance (STA)	\$27,000				x	x	x	x			25% available to any eligible transit project (METRO, community transit, rail, etc.) and 75% available for METRO services only.
SB 1 - State Transit Assistance (STA)- State of Good Repair	\$11,000				x	x					25% available to any eligible transit project (METRO, community transit, rail, etc.) and 75% available for METRO services only.
State Transportation Improvement Program (STIP)	\$44,000	x	x	x	x	x				x	100% of Santa Cruz County regional STIP share to UCS projects moving forward; 12 years of funds not already programmed.
Active Transportation Program	\$44,000			x						x	Based on past Santa Cruz County ATP grant cycle recipients, applications, and competitiveness.
Low Carbon Transit Operations Program	\$7,000						x	x			Formula share. Available for transit capital and initial years of new greenhouse gas reducing service.
SB1 Local Partnership Program	\$9,000	x	x	x	x	x				x	Formula share. 50% available to any eligible transportation projects. 50% available for METRO services only.

FUNDING SOURCES	17-year total (in thousands)	Highway Improvements	Intersection Improvements	Bicycle and Pedestrian Improvements	Rail Capital	Bus Capital ²	Bus Transit Service on Roadways O&M ³	Rail or Bus Transit Rail Right-of-Way O&M	Education and Enforcement	Trail	DESCRIPTION
SB1 - Local Partnership Program (LPP) Competitive	\$11,000	x	x	x	x	x				x	% of Santa Cruz County population relative to California population.
SB1-Solutions for Congested Corridors	\$23,000	x		x	x	x					% of Santa Cruz County population relative to California population and % of Santa Cruz County maintained roadway miles relative to California.
Trade Corridor Enhancement Program (TCEP)	\$14,000	x			x						Based on Santa Cruz County population relative to California population
Transit and Intercity Rail Capital Program (TIRCP) - bus	\$900					x	x				Based on Santa Cruz County population relative to California population.
Transit and Intercity Rail Capital Program (TIRCP) - rail	\$60,000				x			x			Based on Santa Cruz County population relative to California population and competitiveness due to connections to interregional and statewide services.
Affordable Housing & Sustainable Communities	\$8,000				x	x					0.8% of funds to Santa Cruz County from California estimated allocations.
Highway Safety Improvement Program (HSIP)	\$4,000	x	x	x						x	Based on past Santa Cruz County HSIP grant cycle recipients and applications.
Zero Emission Truck and Bus Pilot Projects	\$500					x					0.8% of funds to Santa Cruz County from California estimated allocations.

FUNDING SOURCES	17-year total (in thousands \$000s)	Highway Improvements	Intersection Improvements	Bicycle and Pedestrian Improvements	Rail Capital	Bus Capital ²	Bus Transit Service on Roadways O&M ³	Rail or Bus Transit O&M	Education and Enforcement	Trail	DESCRIPTION
State Rail Assistance Program	\$4,000				x			x			One-sixth of statewide funds allocated to commuter rail services to Santa Cruz County.
State Transportation Improvement Program (STIP) - Interregional Share - Public Transportation Account	\$10,000				x	x					9% of interregional program designated for rail transit programs. Assumes Santa Cruz County will receive \$10m over 17 years.
FEDERAL SOURCES											
Surface Transportation Block Grant (STBG)	\$26,000	x	x	x	x	x				x	50% of Santa Cruz County share for regional projects.
Fixed Guideway Capital Investment Grants (5309)	\$50,000				x	Bus on Fixed Guide way Only					Santa Cruz County % of population relative to California population and California population relative to US.
BUILD (son of TIGER)	\$25,000	x	x	x	x	x				x	Assumes Santa Cruz County receives maximum grant amount.
FTA Commuter Rail Positive Train Control Grants	\$1,000				x						Santa Cruz County % of population relative to California population and California population relative to US.
FTA Bus & Bus Facilities Infrastructure Investment Program	\$1,000					x					Santa Cruz County % of population relative to California population and California population relative to US.
Rail/Highway Grade Crossing Protection (USC Section 130)	\$4,000				x						0.8% of funds to Santa Cruz County from California estimated allocations.

FUNDING SOURCES	17-year total (in thousands \$000s)	Highway Improvements	Intersection Improvements	Bicycle and Pedestrian Improvements	Rail Capital	Bus Capital ²	Bus Transit Service on Roadways O&M ³	Rail or Bus Transit Rail Right-of-Way O&M	Education and Enforcement	Trail	DESCRIPTION
Automatic Grade-Crossing Programs	\$1,000				x						Minimum allocation of \$1 million, based on awards to other rail systems.
Federal Lands Access Program (FLAP)	\$6,000									x	Grant received for the North Coast Rail Trail project (MBSST Segment 5).
OTHER SOURCES											
Transit on Roadways Fares (Bus) ⁴	vary by scenario						x				Fares from bus service on roadways. Based on METRO transit revenues.
Transit on Rail Right-of-Way Fares (Rail and Bus Rapid Transit) ⁵	vary by scenario							x			Fares from transit service (rail or bus rapid transit) on the rail right-of-way. Assume average \$5.50 fare.
Rail Line Lease, Concession Revenue and Advertising	\$13,000				x			x			Revenues generated from rail leases, concessions and advertising based on revenues earned by other transit operators
Other	\$9,000								x		Continue FY17/18 Safe Authority for Freeway Emergency and Transportation Development Act funds to Ecology Action, Community Traffic Safety Coalition. New non-traditional transportation funding grants to provide 50% match.
TOTAL FOR UCS PROJECTS	\$570,000										

¹ Measure D revenues dedicated to funding auxiliary lanes between Soquel and 41st, Bay & Porter to Park Avenue and Park Avenue to State Park Drive is assumed in every scenario and is not listed here.

² Includes infrastructure for Soquel/Freedom Bus Rapid Transit and Bus Rapid Transit on Rail Right-of-Way.

³ Includes bus transit service to support Highway Occupancy Vehicles, Bus on Shoulders, Bus Rapid Transit lite on Soquel/Freedom, local bus connections to rail.

⁴ Transit fares revenues for local bus service for each scenario are calculated based on the 2016 total Metro fare revenues multiplied by the estimated increase in ridership for each scenario.

⁵ Rail transit fares assume an average fare of \$5.50. This is based on examples of a zone fare structure adopted by some San Francisco Bay Area transit systems and the Sonoma Marin Area Regional Transit System, which apply a lower fare for shorter distance travel and increase the fare for longer distance travel with a range of fares that could range from \$3.50 to \$7.50, depending on the distance traveled. Fares for Bus Rapid Transit on the rail right-of-way are assumed to be the same as rail transit fares.