Appendix A:

Transportation Projects, Programs, and Phasing

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Appendix A: Transportation Projects, Programs, and Phasing

San Diego Forward: The 2021 Regional Plan (2021 Regional Plan) re-envisions the regional transportation system that connects us to where we want to go. This appendix breaks down the system into its components—projects, programs, and operations. It details how each project is phased, when specific improvements are expected to be completed, and their cost. Details on cost estimation are included in Appendix U: Cost Estimation Methodology.

California Assembly Bill 805 (Gonzalez Fletcher, 2017) (Chapter 658, Statutes of 2017) requires, among other things, that the 2021 Regional Plan identify disadvantaged communities and include transportation strategies to reduce pollution in these communities. Appendix A, Attachment 2 shows the location of disadvantaged communities and identifies specific transportation strategies to reduce exposure to pollution in these communities.

The tables that detail projects in this appendix include information such as the name of the project, a description of the project, and the cost of the project in 2020 dollars as part of the financially constrained plan. Table A.19 shows several illustrative goods movement projects for which funding has not yet been identified (i.e., they are considered part of a financially "unconstrained" plan).

This appendix is organized generally as follows:

1. A description of the types of transportation improvements that make up the transportation system.
2. A series of tables that identify specific transportation improvements by corridor (**Tables A.1–A.11:** Major Corridors)
3. A series of tables that identify specific transportation improvements by type:
    - **Table A.12:** Rural Corridors
    - **Table A.13:** Arterials
    - **Table A.14:** Mobility Hubs and Flexible Fleets
    - **Table A.15:** Next Operating System
    - **Table A.16:** Systemwide Transit Supportive Services
    - **Table A.17:** Supporting Policies and Programs
    - **Table A.18:** Other Systemwide Programs
    - **Table A.19:** Unconstrained Goods Movement Projects
4. A series of maps that show the progression of improvement through the implementation phases

Types of Transportation Improvements

Transportation improvements identified for each of the major corridors in Table A.1 through Table A.11 are grouped into the following project types and include a year-built phasing period (2025, 2035, and 2050) for each project.

Active Transportation

Active transportation projects include both on- and off-street improvements to create safe and comfortable paths for walking and biking. The costs reflect the comprehensive nature of active transportation projects, which often include retrofitting existing streets and roadways to meet the needs of users of all ages and abilities.

Complete Corridor: Active Transportation and Demand Management/Smart Intersection Systems

Active Transportation and Demand Management (ATDM) and Smart Intersection Systems (SIS) use technology to improve traffic flow and safety on our roadways. These technologies have been applied to freeways and arterial roadways in the regional transportation system.

Complete Corridor: Managed Lanes

Managed Lanes (MLs) offer priority access to people using transit, carpooling, riding motorcycles, or vanpooling along with emergency vehicles and some low-emission vehicles with appropriate decals. An example of MLs is currently on I-15 between SR 163 and SR 78. In the 2021 Regional Plan, MLs are expanded by repurposing shoulders or existing travel lanes, as feasible. Maps and tables in this appendix use descriptions of MLs to indicate the number of MLs in addition to the freeway lanes included in the total configuration for that phase. For example, a freeway segment labeled “8F+2ML” would represent eight freeway lanes plus two MLs on that segment. Many of the MLs will be fully built by 2035.

ML improvements are planned for both interregional and urban corridors. Interregional corridors connect us to neighboring counties and beyond and account for about 70% of vehicle miles driven on the region’s freeways. Urban corridors connect local cities and account for 27% of vehicle miles driven on the region’s freeways. Interregional corridor trips are typically longer than 20 miles while trips made on urban corridors are often between 5 and 20 miles.

Complete Corridor: Managed Lanes Connectors and Direct Access Ramps

Managed Lane Connectors (MLCs) seamlessly connect MLs, for example connecting an ML on I-15 to a future ML on SR 78. Direct Access Ramps (DARs) are freeway on-ramps that connect a local road directly to an ML on the freeway. These improvements could take the form of a transit-only lane, ramp modification, or technology enhancement. Also, some projects are included as Interchange and Arterial Operation Improvements which are improvements to facilities and adjacent roadways that connect two intersecting facilities.

Transit Leap

Transit Leap improvements make public transit a compelling option to driving—fast, convenient, and safe. Improvements include commuter rail, light rail, *Rapid*, local bus, and ferry service. Next Generation *Rapid* Service is a *Rapid* bus service operating in priority travel lanes and/or separated guideways and is given traffic signal priority. Many of the *Rapid* routes will be fully built in 2035 and 2050 as described in the tables, while some of the *Rapid* routes will be expedited to open sooner in 2025 with a "light version" (Phase 1). The light version of *Rapid* is meant to allow for a *Rapid* route to operate with minimal capital investment using existing bus stops. The full version of *Rapid* will build up the route's amenities with improved shelters, bus guideways, and/or other transit priority measures. Commuter rail includes new and significantly upgraded rail service with high-speed trains that are fast and convenient and provide a compelling alternative to driving. Light Rail Transit (LRT) includes improvements to existing light rail services and new tram services. Ferry service operating in San Diego Bay is also included here.

Goods Movement

Projects in this category support goods movement improvements at freight gateways (land border crossings, maritime terminals, and air cargo terminals), on rail lines, and on roadways. Goods movement supportive projects are sometimes aligned with ML or other Complete Corridor and Transit Leap projects and are indicated in the tables; others are stand-alone projects for goods movement improvements.

Transportation System Phasing

The transportation system in the 2021 Regional Plan and its phasing by 2025, 2035, and 2050 are designed to address social equity, congestion, and state/federal mandates. Project "phasing" is a reference to the specific time periods when projects are anticipated to be in service and available to the public. For the 2021 Regional Plan, the 2025 phase year includes projects planned to be in service between 2021 and 2025; the 2035 phase year references the time period where projects would be in service between 2026 and 2035; and the 2050 phase year references the time period where projects would be in service between 2036 and 2050. The intent of the project phasing is to advance as many Transit Leap projects as possible first along with their associated supportive roadway improvements (such as MLs) based on the anticipated revenues.

Additionally, staff considered various factors and inputs in both the development and phasing of the projects and programs included in the 2021 Regional Plan, which are summarized as follows (and further described in Appendix T: Network Development and Performance):

- **Project Readiness:** A review and understanding of project readiness to help ensure that projects are ready for development and implementation as planned. This includes the evaluation of project construction duration by project type (e.g., Complete Corridor, Transit Leap, etc.), which often varies by mode type (e.g.,

commuter rail, *Rapid*, etc.). Timeframe observed on current or previous projects of similar type help to inform this component.

- **Project Connectivity:** Project connectivity is considered largely to leverage synergies among projects (e.g., MLCs for intersecting MLs or *Rapid* service on MLs) and timelines of adjacent supportive projects, and to ensure that projects are phased in consecutive segments.
- **Evaluation Criteria:** Evaluation criteria is a helpful tool to showcase the merits of projects or a group of projects. For the 2021 Regional Plan, SANDAG applied a project "bundle" (grouped projects by corridor) evaluation criteria approach to rank corridors according to anticipated benefit. The criteria included prioritizing access to transit for the region's social equity focus populations among other things.
- **Phased Revenues:** Anticipated revenues are essential to determining what projects are included in the financially constrained 2021 Regional Plan and when those projects can be anticipated for construction and operation. The type of funding available is also critical because, for example, some funding sources only can be used for capital or construction projects and other sources for operating transit services or road maintenance.

Each of these factors was scored in order to help phase individual projects in the transportation system according to the type of project. For transit projects, projected ridership on individual routes (estimated by initial travel modeling) was considered in order to further clarify project phasing. This helped determine which transit projects to advance in earlier phases, particularly by 2035, based on the availability of revenues. Emphasis was placed on aligning flexible funding with transit projects and operational improvements, given the need to meet federal and state mandates for social equity, air quality, and greenhouse gas reductions.

Major Corridors

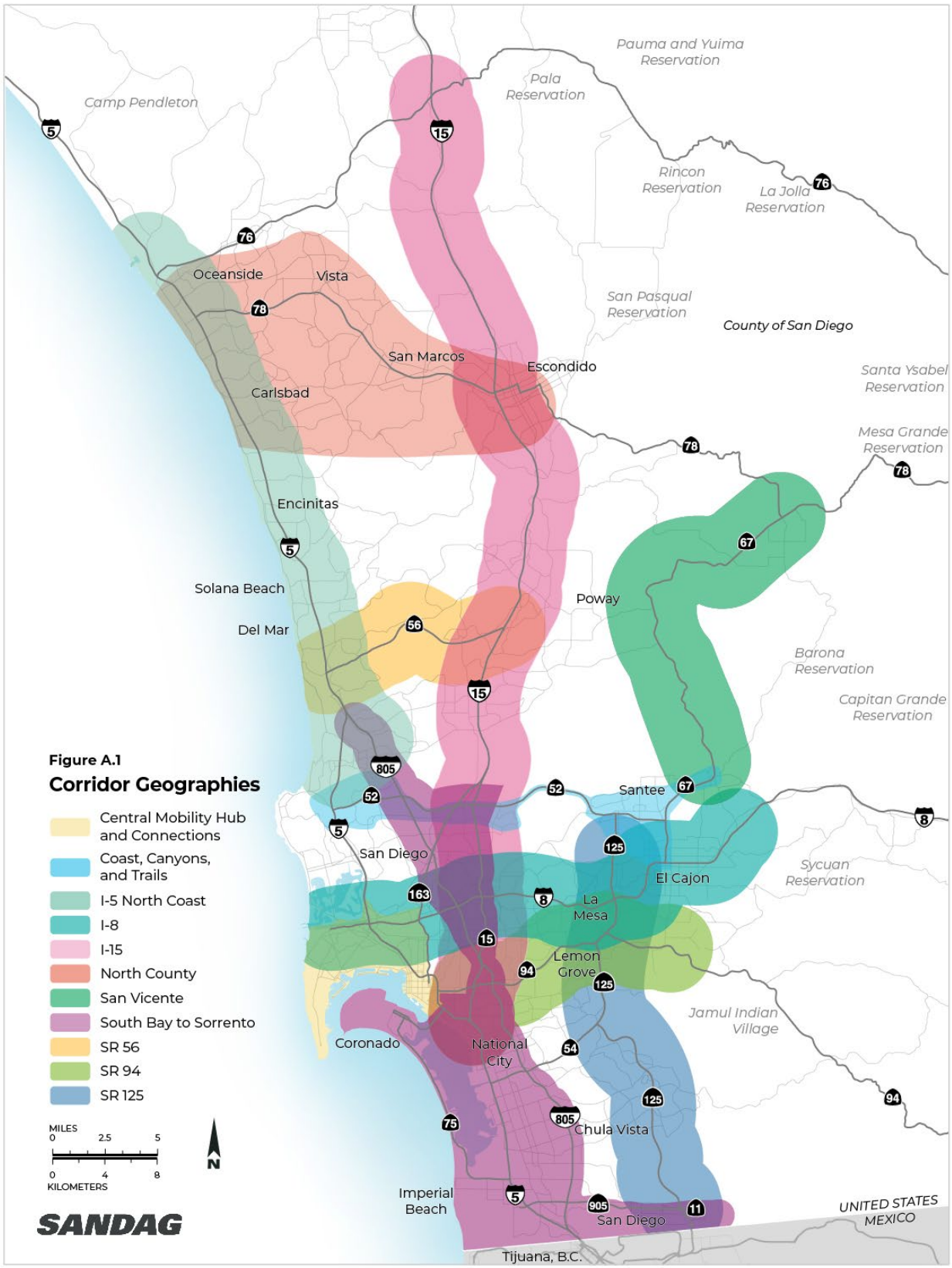
Our region's 3.3 million residents, and others who visit to do business here, vacation, visit family, and even just pass through the area on their way to somewhere else, rely on major corridors for travel. They make up the primary circulatory system that keeps people moving as they seek economic opportunity, pursue education and training, and travel for a myriad of other reasons that enhance their quality of life.

The 2021 Regional Plan charts a course for "Complete Corridors" that will make travel along them safer and more efficient, while offering people more alternatives to driving alone—including more transit options, more rideshare options, and more opportunities for biking, walking, and other forms of active transportation. Along these major corridors of travel, mobility hubs will be strategically placed to offer people vital connections to a variety of transportation options for both short and long trips. Mobility hubs will be places of connectivity where people work, live, and connect with one another and the modes of travel they need to reach their destinations.

The 2021 Regional Plan has identified 11 major corridors of travel in our region, as well as improvements for each corridor. This appendix details those improvements. Tables A.1 through A.11 include detailed listings of the transit, roadway, active transportation, and technology improvements for each of the corridors. Figure A.1 depicts the 11 major corridors of travel in our region. Plans for a regional Central Mobility Hub north of Downtown San Diego, and the connections it will provide to the San Diego International Airport and numerous other destinations, is included in this list as it will serve as a major corridor of travel in its own right. The 11 major corridors discussed in the 2021 Regional Plan are:

1. South Bay to Sorrento Corridor
2. Central Mobility Hub and Connections
3. State Route 125 Corridor
4. Interstate 15 Corridor
5. Interstate 5 North Coast Corridor
6. State Route 94 Corridor
7. Interstate 8 Corridor
8. Coast, Canyons, and Trails Corridor
9. State Route 56 Corridor
10. San Vicente Corridor
11. North County Corridor

Figure A.1: Corridor Geographies



South Bay to Sorrento Corridor

Essential to international trade with Mexico and a key north-south corridor for people who live in communities throughout the South Bay and work in San Diego, the South Bay to Sorrento Corridor is vital for the region's economic prosperity. As a result, the 28 miles it covers are some of the region's most congested. The South Bay to Sorrento Corridor features significant transportation infrastructure designed to move people and goods between the U.S. and Mexico, through densely populated South Bay and Central San Diego communities, and to the region's largest employment centers in Kearny Mesa and Sorrento Valley. The corridor traverses several cities in San Diego County, including San Diego, Chula Vista, Coronado, National City, and Imperial Beach. Major roadways include I-5, I-8, I-805, SR 52, SR 54, SR 94, and SR 905. Travelers along this corridor are also served by major arterials and the Bayshore Bikeway. People who travel using public transportation can ride the COASTER, the UC San Diego Blue Line Trolley, multiple *Rapid* lines, and more than 25 local bus lines. The Orange and Green Line Trolley also bisect this corridor. Given the importance of this heavily traveled corridor to regional and international mobility, a variety of transportation improvements are planned. Some of these improvements include the following:

Active Transportation

Nearly 30 projects are planned to build up the interconnected bikeway systems along this corridor.

Complete Corridor: Managed Lanes and Goods Movement

MLs added to I-5 and I-805 will ease congestion—in part by giving priority access to *Rapid* transit vehicles—and promote seamless travel throughout the region. The movement of freight and other goods within the region and across the international border will become more efficient through improvements to SR 11, SR 905, I-5, and I-805; Harbor Drive; and new and improved facilities at land and sea ports of entry (POEs).

Transit Leap/Mobility Hubs

The much-anticipated commuter rail project in this corridor is the Purple Line at the heart of the South Bay to Sorrento Corridor. It will connect nearly the entire corridor, from San Ysidro to many of our region's urban communities and major job centers in Kearny Mesa, University City, and Sorrento Valley. Additionally, there are plans to enhance existing Trolley lines, including the Blue Line, to allow for higher speeds, broader spans of service, and more capacity. Complementing the expanded Trolley lines and providing travelers with additional public transit choices, the *Rapid* transit program will include more than 20 routes along the South Bay to Sorrento Corridor—many of which are scheduled to be in service before 2035. Mobility hubs are places of connectivity where mobility services, technology, and a variety of amenities create a landing spot for travelers to connect with high-frequency transit services, bike and rideshare options, and a variety of other modes of travel. One of the largest mobility hubs in the region is being planned at the San Ysidro Intermodal Transit Center at the international border with Mexico. Other mobility hubs are planned for urban communities and major education and employment centers throughout the corridor.

Projects in Table A.1 are organized by project type (Active Transportation, Complete Corridor: ATDM/SIS, Complete Corridor: ML, Complete Corridor: ML/Goods Movement, Complete Corridor: Connectors [DAR, Transit Operational Improvement, MLC], Goods Movement: Border, Goods Movement: Roadways, Transit Leap, Transit Leap/Mobility Hubs, and Transit Leap/Goods Movement) and by phasing period (2025, 2035, and 2050) within those project types.

Table A.1: South Bay to Sorrento

South Bay to Sorrento						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT002	2025	Active Transportation	Central Avenue Bikeway	Off-Street and On-Street	I-8, I-15, SR 94	$4
AT004	2025	Active Transportation	North Park/Mid-City Bikeways: Orange Avenue	On-Street	I-8, I-15	$11
AT005	2025	Active Transportation	North Park/Mid-City Bikeways: Howard Avenue	On-Street	I-8, Central Mobility Hub (CMH)	$9
AT006	2025	Active Transportation	North Park/Mid-City Bikeways: Robinson Avenue	Off-Street and On-Street	I-8	$5
AT008	2025	Active Transportation	Bayshore Bikeway: Ada Street to Palomar Street	Off-Street	N/A	$3
AT015	2035	Active Transportation	Bayshore Bikeway: Main Street to Ada Street	Off-Street	N/A	$5
AT019	2035	Active Transportation	Chula Vista (J Street) Bikeway	On-Street	N/A	$9
AT021	2035	Active Transportation	City Heights/Fairmount Corridor	Off-Street and On-Street	I-8	$44
AT032	2035	Active Transportation	Coastal Rail Trail San Diego – Carmel Valley to Roselle via Sorrento	Off-Street	I-5 North Coast Corridor (NCC), SR 56	$20
AT033	2035	Active Transportation	Coastal Rail Trail San Diego – Del Mar to Sorrento via Carmel Valley	Off-Street	I-5 NCC, SR 56	$23
AT036	2035	Active Transportation	Coastal Rail Trail San Diego – Roselle Canyon	Off-Street	I-5 NCC	$12
AT037	2035	Active Transportation	Coastal Rail Trail San Diego – University Town Center (UTC) to Rose Canyon	Off-Street	I-5 NCC, Coast, Canyons, and Trails (CCT)	$11
AT040	2035	Active Transportation	Encanto to Chula Vista National City connections	On-Street	I-15	$35
AT047	2035	Active Transportation	Imperial Beach Connector	On-Street	N/A	$10
AT066	2050	Active Transportation	Bay to Ranch Bikeway	On-Street	N/A	$27
AT067	2050	Active Transportation	Border Access Corridor	Off-Street	N/A	$3
AT070	2050	Active Transportation	Central Coast Corridor	On-Street	SR 56, CCT	$65

South Bay to Sorrento						
Project ID	Year Built	Category	Project Name	Description	Connecting Corridor(s)	Cost ($2020) Millions
AT071	2050	Active Transportation	Chula Vista Greenbelt	On-Street	N/A	$34
AT072	2050	Active Transportation	Clairemont – Centre City Corridor	Off-Street and On-Street	I-8, CCT, CMH	$52
AT096	2050	Active Transportation	I-805 Connector	Off-Street	N/A	$7
AT097	2050	Active Transportation	I-805 Connector – Bonita Road to Floyd Avenue	Off-Street	N/A	$10
AT100	2050	Active Transportation	Kearny Mesa to Beaches Corridor – Genesee Avenue to Linda Vista Road	On-Street	N/A	$8
AT101	2050	Active Transportation	Kearny Mesa to Beaches Corridor – Linda Vista Road to I-15 Bikeway	On-Street	I-15	$14
AT107	2050	Active Transportation	Mira Mesa Corridor – I-805 to Scranton Road	On-Street	N/A	$2
AT108	2050	Active Transportation	Mira Mesa Corridor – Scranton Road to I-15 Bikeway	On-Street	I-15	$30
AT109	2050	Active Transportation	Mira Mesa Corridor – Sorrento Valley Boulevard to Mira Mesa Boulevard	On-Street	N/A	$7
AT122	2050	Active Transportation	SR 56 Bikeway – El Camino Real to Caminito Pointe	Off-Street	I-5 NCC, SR 56	$5
AT123	2050	Active Transportation	SR 905 Corridor	Off-Street	SR 125	$74
AT152	2050	Active Transportation	Chollas Creek Bikeways: North Fork – Bayshore Bikeway to University Bikeway and South Fork – Petway Park to Market Creek Plaza[1]	Off-Street and On-Street	SR 94	$85
CC119	2025	Complete Corridor: ATDM/SIS	I-5	SIS	I-5 NCC	$69
CC121	2025	Complete Corridor: ATDM/SIS	I-805	SIS	N/A	$37
CC135	2025	Complete Corridor: ATDM/SIS	SR 54	SIS	N/A	$16
CC141	2025	Complete Corridor: ATDM/SIS	SR 905	SIS	SR 125	$30

[1] Project to be developed in coordination with the City of San Diego including City of San Diego Capital Improvement Program (CIP) project B-17113 (Chollas Creek to Bayshore Bikeway).

South Bay to Sorrento						
Project ID	Year Built	Category	Project Name	Description	Connecting Corridor(s)	Cost ($2020) Millions
CC118	2035	Complete Corridor: ATDM/SIS	I-5	ATDM	I-5 NCC	$888
CC120	2035	Complete Corridor: ATDM/SIS	I-805	ATDM	N/A	$478
CC134	2035	Complete Corridor: ATDM/SIS	SR 54	ATDM	N/A	$73
CC140	2035	Complete Corridor: ATDM/SIS	SR 905	ATDM	SR 125	$157
CC038	2035	Complete Corridor: ML	SR 163 (I-8 to I-805)	8F to 6F+2ML	I-8, CMH	$36
CC039	2035	Complete Corridor: ML	SR 163 (I-805 to SR 52)	8F to 6F+2ML	I-15, CCT	$27
CC040	2050	Complete Corridor: ML	SR 54 (I-805 to SR 125)	6F to 4F+2ML	SR 125	$48
CC045	2025	Complete Corridor: ML/ Goods Movement	SR 11/Otay Mesa East POE (Enrico Fermi to Mexico)	— to 4Toll+POE	SR 125	$482
CC001	2035	Complete Corridor: ML/ Goods Movement	I-5 (SR 905 to H Street)	8F to 6F+2ML	N/A	$51
CC002	2035	Complete Corridor: ML/ Goods Movement	I-5 (H Street to Pacific Highway)	8F to 6F+4ML	I-8, I-15, SR 94, CMH	$378
CC005	2035	Complete Corridor: ML/ Goods Movement	I-5 (I-805 to SR 56)	8F/14F+2HOV to 6F/12F+4ML	I-5 NCC, SR 56	$25
CC017	2035	Complete Corridor: ML/ Goods Movement	I-805 (Palm Avenue to H Street)	8F/8F+2ML to 6F+4ML	N/A	$46
CC018	2035	Complete Corridor: ML/ Goods Movement	I-805 (H Street to I-15)	8F+2ML to 6F+4ML	I-15, SR 94	$163
CC019	2035	Complete Corridor: ML/ Goods Movement	I-805 (SR 15 to I-8)	8F to 6F+4ML	I-8, I-15, SR 94	$96
CC020	2035	Complete Corridor: ML/ Goods Movement	I-805 (I-8 to Mesa College Drive)	10F to 6F+4ML	I-8, I-15	$56
CC021	2035	Complete Corridor: ML/ Goods Movement	I-805 (Mesa College Drive to Balboa Avenue)	8F to 6F+4ML	CCT	$58
CC022	2035	Complete Corridor: ML/ Goods Movement	I-805 (Balboa Avenue to Northbound Bypass Lane)	8F+2ML to 6F+4ML	CCT	$149
CC016	2050	Complete Corridor: ML/ Goods Movement	I-805 (SR 905 to Palm Avenue)	8F to 6F+4ML	N/A	$60
CC041	2050	Complete Corridor: ML/Goods Movement	SR 905 (I-5 to Border)	6F to 4F+2ML	SR 125	$193

South Bay to Sorrento						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
CC115	2050	Complete Corridor: DAR	SR 905 (Beyer Boulevard)	East	N/A	$42
CC116	2050	Complete Corridor: DAR	SR 905 (Siempre Viva Road)	North	SR 125	$42
CC114	2035	Complete Corridor: Transit Operational Improvement	I-805 (Nobel Drive)	North and South	CCT	$49
CC063	2035	Complete Corridor: MLC	I-5 (I-805)	North to North and South to South	N/A	$84
CC069	2035	Complete Corridor: MLC	I-5 (SR 15)	North to North and South to South	I-15, SR 94	$274
CC070	2035	Complete Corridor: MLC	I-5 (SR 15)	South to North and South to North	I-15, SR 94	$274
CC084	2035	Complete Corridor: MLC	I-805 (SR 94)	North to West and East to South	I-15, SR 94	$140
CC085	2035	Complete Corridor: MLC	I-805 (SR 52)	West to North and South to East	CCT	$149
CC087	2035	Complete Corridor: MLC	I-805 (SR 163)	North to North and South to South	N/A	$267
CC090	2035	Complete Corridor: MLC	I-805 (I-8)	North to East and West to South	I-8, I-15	$202
CC092	2035	Complete Corridor: MLC	I-805 (I-8)	South to East and West to North	I-8, I-15	$202
CC071	2050	Complete Corridor: MLC	I-5 (SR 905)	South to East and West to North	N/A	$202
CC086	2050	Complete Corridor: MLC	I-805 (SR 52)	North to West and East to South	CCT	$126
CC089	2050	Complete Corridor: MLC	I-805 (I-8)	North to West and East to South	I-8, I-15	$202
CC091	2050	Complete Corridor: MLC	I-805 (I-8)	South to West and East to North	I-8, I-15	$202
CC093	2050	Complete Corridor: MLC	I-805 (SR 54)	South to East and West to North	N/A	$219
CC094	2050	Complete Corridor: MLC	I-805 (SR 54)	North to East and West to South	N/A	$219
CC095	2050	Complete Corridor: MLC	I-805 (SR 905)	South to West and East to North	N/A	$202
CC096	2050	Complete Corridor: MLC	I-805 (SR 905)	South to East and West to North	N/A	$202
GM01	2025	Goods Movement: Border	Otay Mesa Commercial Vehicle Enforcement Facility (CVEF) Modernization	N/A	N/A	$6
GM02	2025	Goods Movement: Border	Otay Mesa East POE Pilot Programs to Reduce Commercial Vehicle Wait Times	N/A	N/A	$20
GM03	2025	Goods Movement: Border	Otay Mesa Southbound Truck Route and La Media Road	N/A	N/A	$49

South Bay to Sorrento						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
GM04	2050	Goods Movement: Border	Otay Mesa POE Truck Bridge to CVEF	N/A	N/A	$50
GM07	2025	Goods Movement: Roadways	Regional Border Management System and Tolling Equipment	N/A	N/A	$35
GM06	2035	Goods Movement: Roadways	Harbor Drive 2.0: Designated Freight Route: Dedicated lanes and signal priority for truck freight along Harbor Drive	N/A	N/A	$32
GM08	2035	Goods Movement: Roadways	I-5 Working Waterfront Access: Bottleneck Relief between SR 94 and SR 54	N/A	N/A	$50
GM09	2035	Goods Movement: Roadways	Vesta Bridge – Phase 1: Operational improvements SR 15, Main, Harbor, and 32nd Streets	N/A	N/A	$55
GM05	2050	Goods Movement: Roadways	Harbor Drive Multimodal Corridor Improvements: Intelligent transportation systems, removing height and weight conflicts along the truck route, pedestrian crossings and bridges, various truck improvements, bikeway accommodations, streetscape, safety, and parking improvements	N/A	N/A	$192
TL21	2025	Transit Leap	*Rapid* 12 Phase 1	Spring Valley to Downtown via Southeast San Diego (light version of *Rapid*)	I-15, SR 94, SR 125, CMH	$18
TL02[2]	2035	Transit Leap	Commuter Rail 582	Sorrento Mesa to National City via UTC, Kearny Mesa, and University Heights	I-8, I-15, SR 94, CCT	$12,660

[2] The South Bay to Sorrento (SB2S) Comprehensive Multimodal Corridor Plan is completing a more detailed ridership analysis of the Purple Commuter Rail alignment (Route 582). The analysis is studying an alignment that would include stations in City Heights and at SDSU (west campus).

South Bay to Sorrento						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
TL22	2035	Transit Leap	*Rapid* 12 Phase 2	Spring Valley to Downtown via Southeast San Diego (full version of *Rapid*)	I-15, SR 94, SR 125, CMH	$73
TL25	2035	Transit Leap	*Rapid* 41	Fashion Valley to UTC/ UC San Diego via Linda Vista and Clairemont	I-8, CCT, CMH	$58
TL28	2035	Transit Leap	*Rapid* 120	Kearny Mesa to Downtown via Mission Valley	I-8, I-15, CCT, CMH	$109
TL35	2035	Transit Leap	*Rapid* 295	Spring Valley to Clairemont via La Mesa and Kearny Mesa	I-8, I-15, SR 94, SR 125, CCT	$91
TL43	2035	Transit Leap	*Rapid* 625	San Diego State University (SDSU) to Palomar Station via East San Diego, Southeast San Diego, National City	I-8, I-15, SR 94	$197
TL44	2035	Transit Leap	*Rapid* 630	Iris Trolley/Palomar to Kearny Mesa via I-5/ SR 163 and City College	I-8, I-15, SR 94, CCT, CMH	$36
TL46	2035	Transit Leap	*Rapid* 637	North Park to 32nd Street Trolley Station via Golden Hill	I-8, I-15, SR 94	$103
TL48	2035	Transit Leap	*Rapid* 640	San Ysidro to Central Mobility Hub via I-5 and City College	I-8, I-15, SR 94, CMH	$28
TL49	2035	Transit Leap	*Rapid* 709	H Street Trolley Station to Millennia via H Street Corridor, Southwestern College	SR 125	$99
TL53	2025	Transit Leap	*Rapid* 950 Phase 1	Otay Mesa POE to Imperial Beach via SR 905 (light version of *Rapid*)	SR 125	$6
TL58	2035	Transit Leap	Ferry	San Diego – Coronado – Military Ferry	SR 94, CMH	$—
TL59	2035	Transit Leap	*Rapid* 950 Phase 2	Otay Mesa POE to Imperial Beach via SR 905 (full version of *Rapid*)	SR 125	$22
TL03[2]	2050	Transit Leap	Commuter Rail 582	National City to U.S. Border	I-15, SR 94	$2,977
TL04	2050	Transit Leap	Commuter Rail 583	Central Mobility Hub to U.S. Border via Downtown San Diego	I-8, I-15, SR 94, CMH	$7,581

South Bay to Sorrento						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
TL13	2050	Transit Leap	LRT 510	Blue Line (San Ysidro to UTC, grade separations at Taylor/Ash)[3]	I-8, I-15, SR 94, CCT, CMH	$510
TL34	2050	Transit Leap	*Rapid* 293	Imperial Beach to Otay Ranch via Palomar Street	SR 125	$111
TL45	2050	Transit Leap	*Rapid* 635	Eastlake to Palomar Trolley via Main Street Corridor	SR 125	$116
TL47	2050	Transit Leap	*Rapid* 638	Iris Trolley to Otay Mesa via Otay, Airway Drive, SR 905 Corridor	SR 125	$91
TL57	2035	Transit Leap/Mobility Hubs	San Ysidro Mobility Hub	San Ysidro Mobility Hub	N/A	$200
TL12	2035	Transit Leap/ Goods Movement	LRT 510	Blue Line (San Ysidro to UTC, grade separations at 28th Street, 32nd Street, E Street, H Street, Palomar Street, and Blue/Orange track connections at 12th/ Imperial)[3]	I-8, I-15, SR 94, CCT, CMH	$510

Note: The Coast, Canyons, and Trails Comprehensive Multimodal Corridor Plan is completing a more detailed analysis of SR 52 between I-5 and I-805 and the connections at SR 52 and I-5. Improvements for this segment are envisioned to be within the existing corridor footprint where the MLs would be designed through repurposing the existing shoulders and landscaped median.

[3] SANDAG will conduct a Blue Line Express Feasibility and Conceptual Engineering Study as a Near-Term Implementation Action (included in Appendix B: Implementation Actions).

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Figure A.2: South Bay to Sorrento

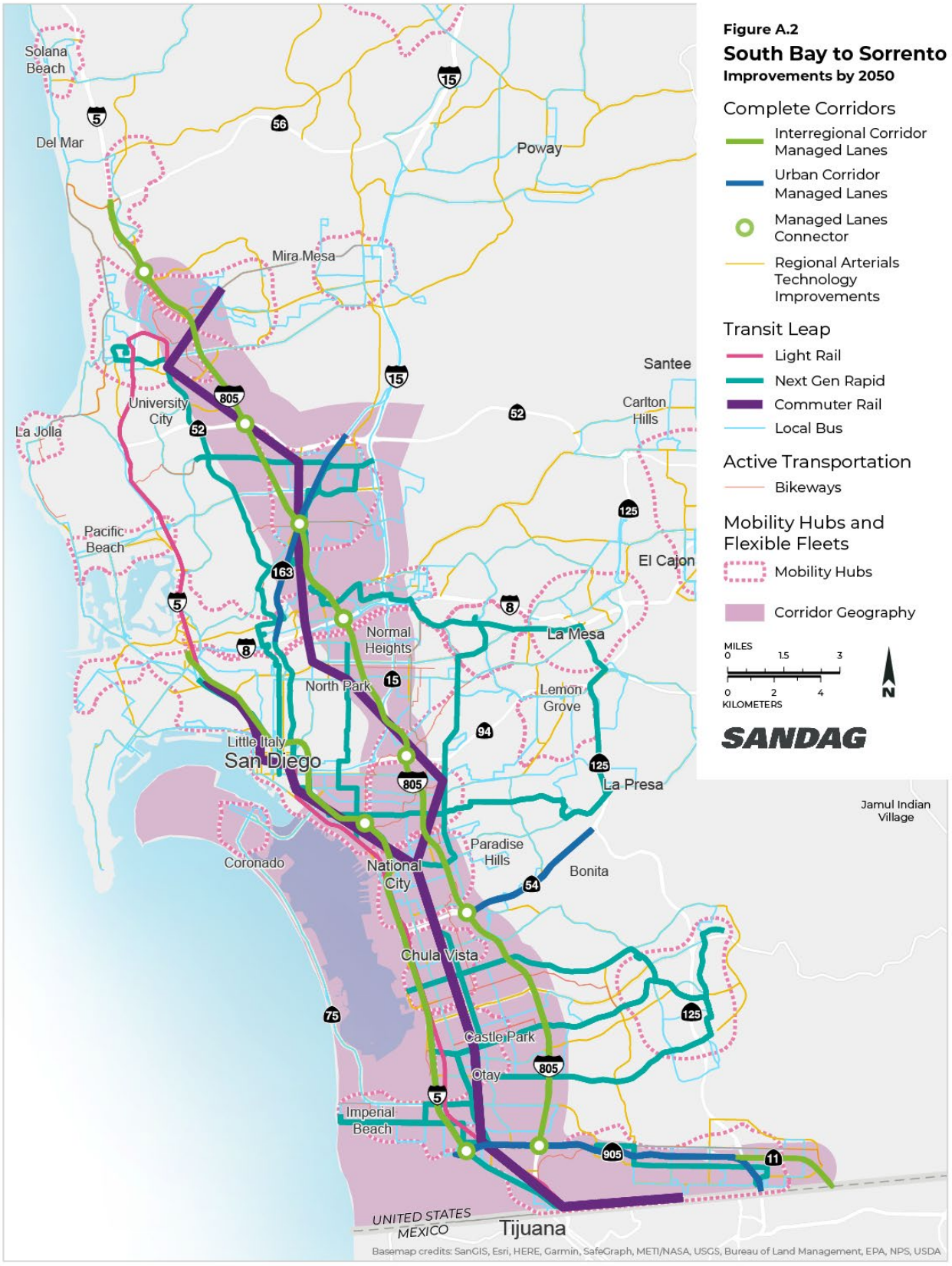

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

Central Mobility Hub and Connections

The 2021 Regional Plan envisions the Central Mobility Hub as a major center of connectivity for the region. Situated just north of Downtown and the San Diego International Airport, it will provide people with a direct connection to the airport while also serving the heavily populated areas of Point Loma, Ocean Beach, Midway, Old Town, Downtown, and Uptown. The Central Mobility Hub will connect people to I-5, I-8, Pacific Highway, Washington Street, and the Old Town Transit Center, which offers travelers connections to the Los Angeles – San Diego – San Luis Obispo (LOSSAN) Rail Corridor, the Trolley, and many bus routes.

As a multimodal transportation center, the Central Mobility Hub will connect all current and future modes of local and interregional public transit. It will also become a gathering place for travelers seeking a wide range of transportation services and amenities.

The Central Mobility Hub overall will provide people with more mobility options, improve access to the San Diego International Airport, enhance circulation throughout surrounding communities, promote safety for walking and biking, and reduce greenhouse gas emissions. Building it will spur job growth and economic activity in our region. In its vicinity, there will be numerous projects outlined in the 2021 Regional Plan. They include 16 Active Transportation projects, 3 Complete Corridor projects, and 4 Transit Leap projects. These improvements will support future residential growth and development.

Projects in Table A.2 are organized by project type (Active Transportation, Complete Corridor: Connectors [Airport Connectivity], Complete Corridor: ML/Goods Movement, Mobility Hubs, and Transit Leap) and by phasing period (2025, 2035, and 2050) within those project types.

Table A.2: Central Mobility Hub

Central Mobility Hub						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT001	2025	Active Transportation	Pershing Bikeway	Off-Street and On-Street	I-15, SR 94, SB2S	$23
AT007	2025	Active Transportation	Uptown Bikeways: Washington Street and Mission Valley Bikeways	On-Street	I-8	$18
AT010	2025	Active Transportation	Uptown Bikeways: Mission Hills and Old Town Bikeways	On-Street	I-8	$6
AT011	2035	Active Transportation	Pacific Coast Highway/Central Mobility Bikeway	On-Street	I-8	$35
AT012	2035	Active Transportation	El Prado: Cross-Park	On-Street	N/A	$1
AT014	2035	Active Transportation	Uptown Bikeways: Park Boulevard Bikeway	On-Street	I-8	$4
AT016	2035	Active Transportation	Bayshore Bikeway Upgrades	Off-Street	SB2S	$17
AT017	2035	Active Transportation	Central Coast Corridor	Off-Street and On-Street	I-8	$37
AT020	2035	Active Transportation	City Heights – Old Town Corridor	On-Street	I-8	$5
AT034	2035	Active Transportation	Coastal Rail Trail San Diego – Mission Bay (Clairemont to Tecolote)	Off-Street and On-Street	I-8	$15
AT035	2035	Active Transportation	Coastal Rail Trail San Diego – Pacific Highway (Fiesta Island Road to Taylor Street)	On-Street	I-8	$6
AT042	2035	Active Transportation	Harbor Drive (Downtown to Ocean Beach)	Off-Street	I-8	$2
AT048	2035	Active Transportation	Imperial Bikeway to J Street Cycle Track Connector	On-Street	SR 94	$3
AT054	2035	Active Transportation	North Park to Downtown	On-Street	I-15, SR 94, SB2S	$3
AT055	2035	Active Transportation	Pacific Beach to East Mission Bay	Off-Street and On-Street	N/A	$23
AT102	2050	Active Transportation	Kearny Mesa to Beaches Corridor – Mission Boulevard to Pacific Beach Drive	On-Street	N/A	$7

Central Mobility Hub						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
CC117	2035	Complete Corridor: Airport Connectivity	Complete Corridor Elements	Airport Connectivity including Laurel Street airport entrance, Laurel Street modifications (Pacific Highway to I-15), and new I-5 freeway ramps at Laurel Street and Redwood	N/A	$836
CC003	2035	Complete Corridor: ML/Goods Movement	I-5 (Pacific Highway to SR 52)	8F to 6F+4ML	I-8, CCT	$353
MHLA1	2035	Mobility Hubs	Central Mobility Hub	Transit station construction and site acquisition	N/A	$2,420
TL23	2035	Transit Leap	*Rapid* 28	Point Loma to Kearny Mesa via Central Mobility Hub, Linda Vista	I-8, I-15, CCT, SB2S	$105
TL52	2035	Transit Leap	*Rapid* 910	Coronado to Downtown via Coronado Bridge	I-15, SR 94, SB2S	$51
TL56	2035	Transit Leap	Direct Transit Connection to Airport	Central Mobility Hub to Airport via Car Rental Lot and Harbor Island East Basin	I-8	$1,398
TL18	2050	Transit Leap	Tram 555	Tram: Downtown to Logan Heights, Golden Hill, South Park, North Park, University Heights, Hillcrest	I-8, I-15, SB2S	$1,175

Figure A.3: Central Mobility Hub and Connections

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

State Route 125 Corridor

The SR 125 Corridor connects East County cities such as El Cajon and La Mesa with San Diego, Chula Vista, and the international border with Mexico at Otay Mesa. At its southern end, the corridor connects to SR 11, SR 905, and the Otay Mesa POE—making it an important corridor for the commercial movement of goods, services, and passengers through an efficient, integrated system that bolsters the local, state, federal, and international economies. Otay Mesa in its own right is projected to be a major economic hub in the future for the South Bay area of our region. Therefore, the SR 125 Corridor will remain an important corridor for this emerging center of commerce and other economic activity. Additionally, SR 125 provides connections to important east-west routes including SR 54, SR 94, and I-8.

The 2021 Regional Plan details several enhancements to increase mobility along this corridor. They include the following:

Active Transportation

Enhancements for SR 125 include the Sweetwater Bikeway, Bonita to the border and at Grossmont College with on-street choices for short trips, recreational, and commuter needs. Active Transportation routes will connect to the planned Regional Mobility Hub Network. Details of this Network are shown for the region in Table A.14 and Figure A.3. These new connectivity centers will streamline multimodal options, including access to high-speed transit, secure bike parking, rideshare, and more. Mobility hubs are planned in Otay Mesa, Chula Vista, Lemon Grove, and El Cajon.

Complete Corridor: Managed Lanes

Key improvements prioritized for 2035 include an extension of MLs along SR 125 from SR 905 to I-8, with enhanced connectors to arterials and freeways such as the I-8 and SR 94. The long-term vision is to connect the entire corridor with the region's ML system.

Transit Leap/Mobility Hubs

ML improvements will support an expansion of service for *Rapid* 292, connecting Otay Mesa, El Cajon, Kearny Mesa, and Pacific Beach mobility hubs. The result: a seamless connection between the international border with Mexico, East County communities, San Diego job centers, and the region's beach communities.

Projects in Table A.3 are organized by project type (Active Transportation, Complete Corridor: ATDM/SIS, Complete Corridor: ML, Complete Corridor: Connectors [DAR, MLC], and Transit Leap) and by phasing period (2025, 2035, and 2050) within those project types.

Table A.3: State Route 125

State Route 125						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT051	2035	Active Transportation	La Mesa Corridor – SR 125 Corridor to East County Northern Loop	On-Street	I-8	$6
AT076	2050	Active Transportation	East County Southern Loop	On-Street	SR 94	$26
AT082	2050	Active Transportation	Grossmont College	On-Street	I-8, CCT	$1
AT115	2050	Active Transportation	SR 125 Connector – Bonita Road to U.S.–Mexico Border	Off-Street and On-Street	SB2S	$85
AT116	2050	Active Transportation	SR 125 Corridor – East County Southern Loop to La Mesa/Lemon Grove/El Cajon connections	On-Street	I-8, SR 94	$32
AT117	2050	Active Transportation	SR 125 Corridor – Grossmont College to Santee – El Cajon Corridor	On-Street	N/A	$12
AT118	2050	Active Transportation	SR 125 Corridor – Sweetwater Bikeway to East County Southern Loop	On-Street	SB2S	$34
CC139	2025	Complete Corridor: ATDM/SIS	SR 125	SIS	N/A	$35
CC138	2035	Complete Corridor: ATDM/SIS	SR 125	ATDM	N/A	$180
CC042	2035	Complete Corridor: ML	SR 125 (SR 54 to Amaya Drive)	6F/8F to 4F/6F+2ML	I-8, SR 94	$59
CC043	2050	Complete Corridor: ML	SR 125 (Amaya Drive to Mission Gorge Road)	6F to 4F+2ML	I-8, CCT	$40
CC044	2050	Complete Corridor: ML	SR 125 (SR 905 to SR 54)	4T to 4F+2ML	SB2S	$227
CC112	2035	Complete Corridor: DAR	SR 125 (Spring Street/SR 94)	South	I-8, SR 94	$42
CC113	2050	Complete Corridor: DAR	SR 125 (Jamacha Boulevard)	North and South	N/A	$49
CC148	2025	Complete Corridor: MLC	SR 125 (SR 905)	South to West	N/A	$38
CC097	2035	Complete Corridor: MLC	SR 125 (I-8)	North to West and East to South	I-8, SR 94	$202
CC098	2035	Complete Corridor: MLC	SR 125 (I-8)	North to East and West to South	I-8, SR 94	$202
CC099	2035	Complete Corridor: MLC	SR 125 (SR 94)	North to West and East to South	SR 94	$203
CC100	2050	Complete Corridor: MLC	SR 125 (SR 52)	North to West and East to South	CCT	$202

State Route 125						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
CC101	2050	Complete Corridor: MLC	SR 125 (SR 54)	South to South and North to North	N/A	$202
CC102	2050	Complete Corridor: MLC	SR 125 (SR 54)	North to West and East to South	N/A	$202
TL033	2035	Transit Leap	*Rapid* 292 Phase 2	Pacific Beach to Otay Mesa via Kearny Mesa, El Cajon, Jamacha, and Otay Lakes (full version of *Rapid*)	I-8, I-15, SR 94, CCT, SB2S	$96

Figure A.4: SR 125

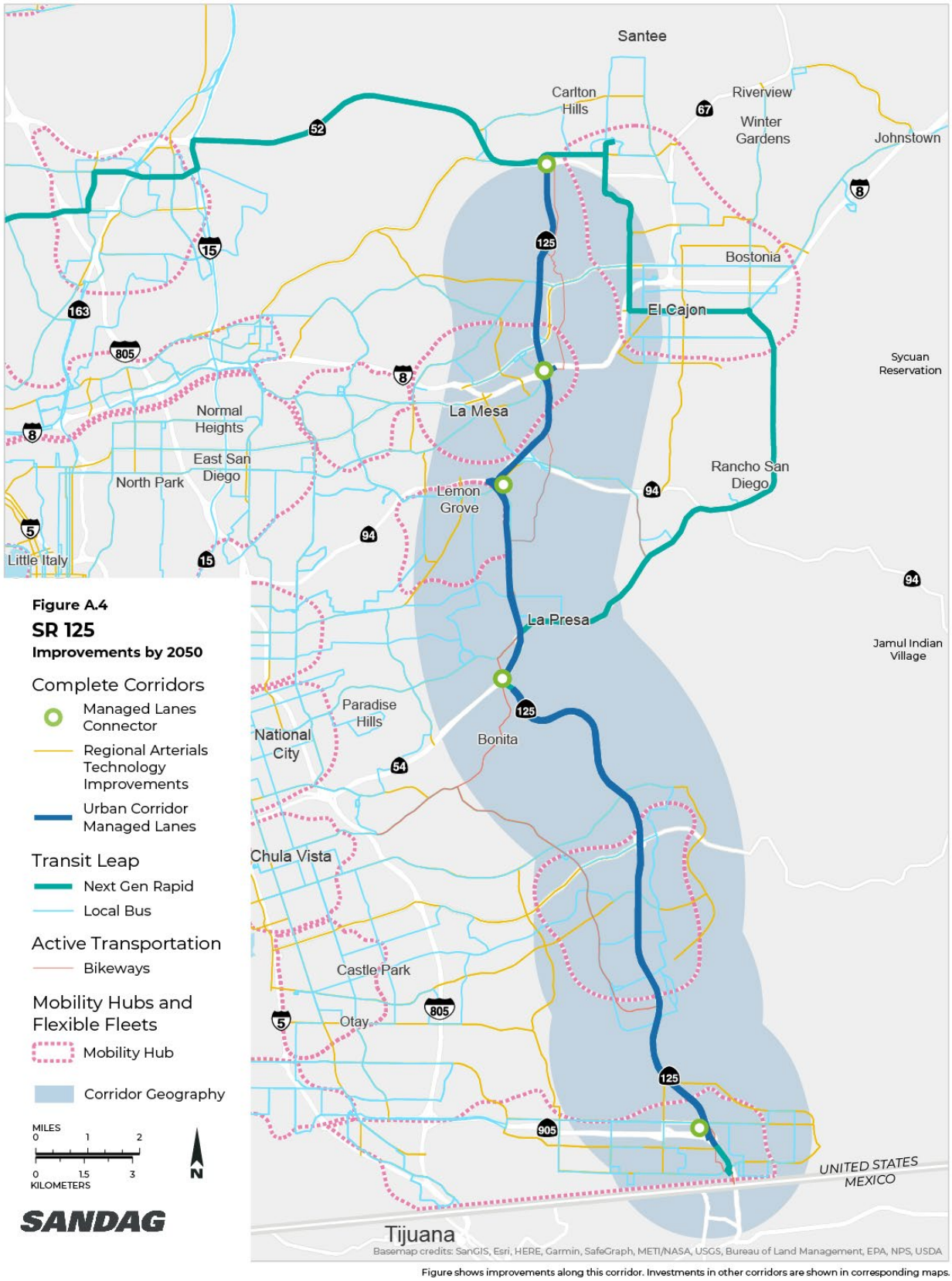

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

Interstate 15 Corridor

The I-15 Corridor is the primary travel corridor for hundreds of thousands of people between San Diego and inland communities throughout North County and beyond to the Inland Empire in Riverside County. The first Express Lanes were added to I-15 in 1988—one of the first of their kind in the United States, which were later to operate between SR 163 and SR 78. These MLs have become a model for other highway improvements around our region, and they will be a key part of making our major corridors of travel increasingly more efficient by prioritizing transit and deploying dynamic pricing throughout the day.

Future improvements will further enhance this Complete Corridor. They include:

Active Transportation

Plans include 18 bikeway and facility projects, including those in Uptown, North Park, Mission Valley, Rancho Bernardo, and Poway.

Complete Corridor: Managed Lanes/Goods Movement

Prioritizing the I-15 with MLs to improve goods movement; promote ATDM; enable SIS; and provide direct connections to I-8, SR 78, SR 52, SR 56, and other roadways. These improvements will provide corridor operators with the flexibility to manage lanes along I-15 in order to meet the demands of traffic conditions by time of day, direction impacted, and type of vehicle.

Transit Leap/Mobility Hubs

Three new *Rapid* bus lines in this corridor will provide enhanced connections from residential communities to major employment centers in Downtown San Diego, Rancho Bernardo, UC San Diego, Sorrento Valley, and Mira Mesa. Residents and commuters will benefit from the added amenities for *Rapid* lines and biking while being able to seamlessly connect with other transportation options via the Regional Mobility Hub Network. The Mobility Hub Network along the I-15 Corridor will streamline multimodal options, including access to high-speed transit, secure bike parking, rideshare, and more with mobility hubs in Escondido, Mira Mesa, Mission Valley, Uptown and Downtown San Diego, and National City. Details of this network are shown for the region in Table A.4 and Figure A.5.

Projects in Table A.4 are organized by project type (Active Transportation, Complete Corridor: ATDM/SIS, Complete Corridor: ML/Goods Movement, Complete Corridor: Connectors [DAR, MLC], and Transit Leap) and by phasing period (2025, 2035, and 2050) within those project types.

Table A.4: Interstate 15

Interstate 15						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT013	2035	Active Transportation	North Park/Mid-City Bikeways: Monroe Bikeway	On-Street	I-8	$6
AT044	2035	Active Transportation	Hillcrest to Balboa Park	On-Street	N/A	$6
AT045	2035	Active Transportation	I-15 Bikeway – Camino del Rio South to Rancho Mission Road	Off-Street and On-Street	I-8, SB2S	$4
AT046	2035	Active Transportation	I-15 Bikeway – Rancho Mission Road to Murphy Canyon Bike Path	Off-Street	I-8, SB2S	$3
AT052	2035	Active Transportation	Mira Mesa Neighborhood Bikeway	On-Street	SB2S	$26
AT053	2035	Active Transportation	Mission Valley – Chula Vista Corridor	On-Street	I-8	$2
AT057	2035	Active Transportation	San Diego River Bikeway – Camino Del Rio North to Father Junipero Serra Trail (Roadway ALT)	On-Street	I-8	$27
AT058	2035	Active Transportation	San Diego River Trail – Camino Del Rio North	On-Street	I-8	$1
AT064	2035	Active Transportation	San Diego River Trail – Rancho Mission Road to Camino Del Rio North	Off-Street	I-8	$1
AT084	2050	Active Transportation	I-15 Bikeway – Citracado Parkway to Country Club Lane	On-Street	North County Corridor	$31
AT085	2050	Active Transportation	I-15 Bikeway – Country Club Lane to Rainbow Valley Boulevard	On-Street	N/A	$128
AT086	2050	Active Transportation	I-15 Bikeway – Murphy Canyon Road to Affinity Court	Off-Street and On-Street	CCT, SB2S	$85
AT087	2050	Active Transportation	I-15 Bikeway – Poway Road Interchange to Carmel Mountain Road	Off-Street	SR 56	$76
AT088	2050	Active Transportation	I-15 Bikeway – Rancho Bernardo Community Park	Off-Street	N/A	$4
AT090	2050	Active Transportation	I-15 Bikeway – Via Rancho Parkway to Citracado Parkway	Off-Street and On-Street	North County Corridor	$5

Interstate 15						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT091	2050	Active Transportation	I-15 Bikeway – Via Rancho Parkway to Lost Oak Lane	Off-Street	North County Corridor	$12
AT105	2050	Active Transportation	Mid-County Bikeway – Inland Rail Trail Connection	On-Street	North County Corridor	$12
AT111	2050	Active Transportation	Poway Loop	On-Street	SR 56	$41
CC123	2025	Complete Corridor: ATDM/SIS	I-15	SIS	N/A	$55
CC137	2025	Complete Corridor: ATDM/SIS	SR 163	SIS	N/A	$19
CC122	2035	Complete Corridor: ATDM/SIS	I-15	ATDM	N/A	$663
CC136	2035	Complete Corridor: ATDM/SIS	SR 163	ATDM	N/A	$101
CC011	2035	Complete Corridor: ML/ Goods Movement	I-15 (I-5 to I-805)	6F to 6F+2ML	SR 94, SB2S	$103
CC012	2035	Complete Corridor: ML/ Goods Movement	I-15 (I-805 to I-8)	8F+2TL to 6F+2TL+2ML	I-8, SR 94, SB2S	$115
CC013	2035	Complete Corridor: ML/ Goods Movement	I-15 (I-8 to SR 163)	8F to 6F+4ML	I-8, CCT, SB2S	$241
CC014	2050	Complete Corridor: ML/ Goods Movement	I-15 (Valley Parkway to SR 76)	8F to 6F+3ML	N/A	$408
CC015	2050	Complete Corridor: ML/ Goods Movement	I-15 (SR 76 to County Line)	8F to 6F+3ML	North County Corridor	$199
CC110	2035	Complete Corridor: DAR	I-15 (Clairemont Mesa Boulevard)	North and South	N/A	$49
CC073	2035	Complete Corridor: MLC	I-15 (SR 78)	East to South and North to West	North County Corridor	$147
CC074	2035	Complete Corridor: MLC	I-15 (SR 52)	West to North and South to East	CCT, SB2S	$181
CC075	2035	Complete Corridor: MLC	I-15 (SR 52)	North to West and East to South	CCT, SB2S	$196
CC076	2035	Complete Corridor: MLC	I-15 (SR 52)	North to East and West to South	CCT, SB2S	$196

Interstate 15						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
CC077	2035	Complete Corridor: MLC	I-15 (SR 52)	South to West and East to North	CCT, SB2S	$196
CC079	2035	Complete Corridor: MLC	I-15 (I-8)	North to West and East to South	I-8, SB2S	$202
CC080	2035	Complete Corridor: MLC	I-15 (I-8)	North to East and West to South	I-8, SB2S	$202
CC081	2035	Complete Corridor: MLC	I-15 (I-8)	South to West and East to North	I-8, SB2S	$202
CC082	2035	Complete Corridor: MLC	I-15 (I-8)	South to East and West to North	I-8, SB2S	$202
CC083	2035	Complete Corridor: MLC	I-805 (SR 15)	North to North and South to South	SR 94, SB2S	$112
CC072	2050	Complete Corridor: MLC	I-15 (SR 78)	South to West and East to North	North County Corridor	$147
CC078	2050	Complete Corridor: MLC	I-15 (SR 56)	South to West and East to North	SR 56	$239
TL29	2035	Transit Leap	*Rapid* 235	Escondido to Downtown San Diego via I-15 (DAR stations)	I-8, SR 56, SR 94, CCT, North County Corridor, SB2S	$34
TL30	2035	Transit Leap	*Rapid* 237	UC San Diego to Rancho Bernardo via Sorrento Valley and Mira Mesa	SR 56, CCT, SB2S	$54
TL31	2035	Transit Leap	*Rapid* 238	UC San Diego to Rancho Bernardo via Sorrento Valley and Carroll Canyon	SR 56, CCT, SB2S	$78

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Figure A.5: I-15

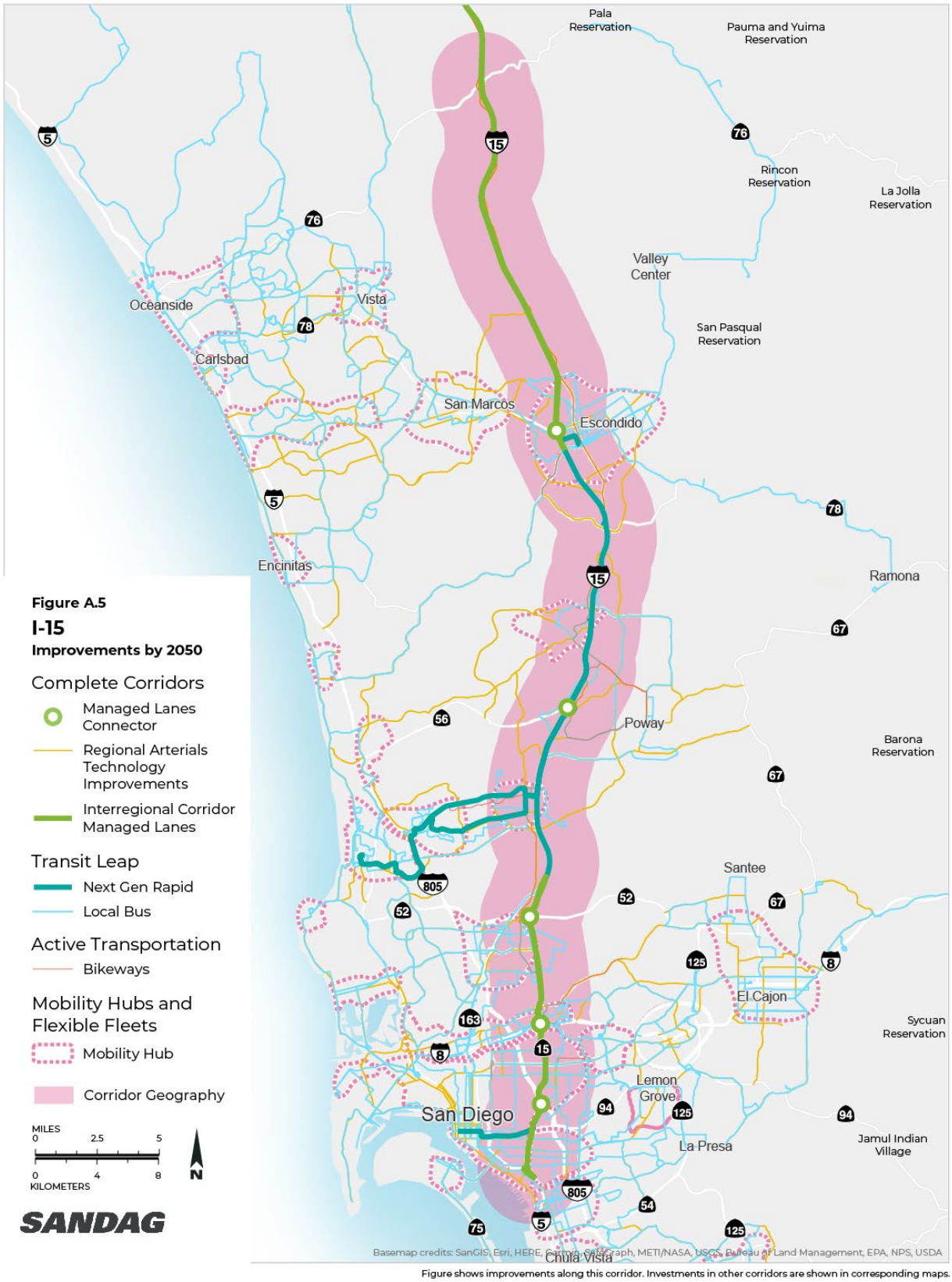

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

Interstate 5 North Coast Corridor

The I-5 is an iconic travel corridor for the State of California, and in the San Diego region the I-5 North Coast Corridor provides people with vital connections to the San Diego metropolitan area, beach communities from Oceanside to Imperial Beach, dynamic academic and research communities at UC San Diego and the Torrey Pines Mesa, high-tech employment centers in Sorrento Valley and in North County, numerous family attractions along the coast, coastal neighborhoods from La Jolla to Oceanside, and Orange County and beyond to the north. The LOSSAN Rail Corridor, which stretches 351 miles from San Diego north, includes North County Transit District's popular COASTER and SPRINTER service, along with Amtrak passenger trains and goods movement on the Union Pacific and BNSF railways. Recreation and commuting along the Coastal Rail Trail provides quality access for active transportation users. The 2021 Regional Plan focuses on highway capacity improvements on facilities that move more people, not just cars. The projects detailed in the 2021 Regional Plan will improve reliability and capacity along the rail corridor, increase facilities for walking and biking, and protect and enhance environmental resources. They include the following:

Active Transportation

The coastal cities of Oceanside, Carlsbad, Encinitas, Solana Beach, Del Mar, and San Diego all will benefit from greater regional mobility and beach access. To improve coastal access for bicyclists and pedestrians, a handful of active transportation projects are slated for early implementation between 2026 and 2035. Other Coastal Rail Trail connections and additional bikeway facilities will be in place by 2050.

Complete Corridor: Managed Lanes

Complete Corridor and ML projects will enhance movement on freeways for goods and vehicles, allowing transportation lanes to be dynamically changed to accommodate the types of vehicles on the road, the time of day, and the level of congestion.

Transit Leap/Mobility Hubs

The I-5 North Coast Corridor is lined with major tourist destinations and dynamic communities—both of which are included in the Regional Mobility Hub Network. This network will provide travelers with amenities to improve their travel options. New mobility hubs along the corridor will streamline travel options for people, including access to high-speed transit, secure bike parking, and rideshare with mobility hubs along the coast, in urban centers, and via the Central Mobility Hub connecting to the San Diego International Airport. Major transit projects include moving the COASTER off of the Del Mar Bluffs into a tunnel, adding a branch line and a station in Sorrento Mesa to connect the COASTER with the Purple Line, constructing the Miramar Tunnel to streamline the line and increase travel speeds, replacing wooden bridges, and adding stations at Camp Pendleton, the Central Mobility Hub, and Downtown San Diego. Additionally, a *Rapid* route will be added from Oceanside to UTC to connect riders with major tourist and employment areas that the COASTER does not serve.

Projects in Table A.5 are organized by project type (Active Transportation, Complete Corridor: ML, Complete Corridor: ML/Goods Movement, Complete Corridor: Connectors [DAR, Interchange and Arterial Operational Improvements], Transit Leap, and Transit Leap/Goods Movement) and by phasing period (2025, 2035, and 2050) within those project types.

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Table A.5: Interstate 5 North Coast Corridor

Interstate 5 North Coast Corridor						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT022	2035	Active Transportation	Coastal Rail Trail Connections – Oceanside and Carlsbad	Off-Street and On Street	SB2S	$0.3
AT028	2035	Active Transportation	Coastal Rail Trail Del Mar	Off-Street	SR 56	$26
AT029	2035	Active Transportation	Coastal Rail Trail Encinitas – Carlsbad to Leucadia Boulevard	Off-Street	N/A	$12
AT073	2050	Active Transportation	Coastal Rail Trail Connections	On-Street	N/A	$16
AT080	2050	Active Transportation	Encinitas to San Marcos Corridor – Leucadia Boulevard to El Camino Real	Off-Street	N/A	$6
AT151	2050	Active Transportation	North Coast Bike Trail: Gilman Drive to San Luis Rey River Trail (remaining segments)	Off-Street and On-Street	SR 56, North County Corridor	$46
CC046	2025	Complete Corridor: ML	I-5 (Manchester to Vandegrift)[4]	8F to 8F+2HOV/HOT	North County Corridor	$171
CC004	2035	Complete Corridor: ML/ Goods Movement	I-5 (SR 52 to I-805)	8F to 6F+4ML	CCT, SB2S	$190
CC007	2050	Complete Corridor: ML/ Goods Movement	I-5 (Via de La Valle to La Costa)	8F to 6F+4ML	N/A	$316
CC008	2050	Complete Corridor: ML/ Goods Movement	I-5 (La Costa to Cassidy Street)	8F to 6F+4ML	North County Corridor	$302
CC009	2050	Complete Corridor: ML/ Goods Movement	I-5 (Cassidy Street to Harbor Drive)	8F to 6F+4ML	North County Corridor	$121
CC010	2050	Complete Corridor: ML/ Goods Movement	I-5 (Harbor Drive to County Line)	8F to 6F+2ML	N/A	$197
CC111	2035	Complete Corridor: DAR	I-5 (Voigt)	North and South	N/A	$49

[4] Project is consistent with the Caltrans North Coast Corridor (Build NCC) project.

Interstate 5 North Coast Corridor						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
CC104	2050	Complete Corridor: Interchange and Arterial Operational Improvements	I-5 (SR 56)	West to North and South to East	SR 56	$379
TL40	2035	Transit Leap	*Rapid* 473	Oceanside to Solana Beach to UTC/UC San Diego via Highway 101 Coastal Communities, Carmel Valley	SR 56, CCT, North County Corridor, SB2S	$156
TL05	2025	Transit Leap/ Goods Movement	Commuter Rail 398	Oceanside to Downtown San Diego (includes upgrades to Pacific Surfliner/ COASTER/Metrolink/freight LOSSAN services from Orange County to Downtown San Diego, wooden bridge replacements, add station at Downtown San Diego)	Central Mobility Hub	$1,203
TL06	2035	Transit Leap/ Goods Movement	Commuter Rail 398	Oceanside to Downtown San Diego (build Del Mar tunnel, add stations at Central Mobility Hub and Camp Pendleton, and grade separation at Leucadia Boulevard)	North County Corridor	$2,875
TL07	2050	Transit Leap/ Goods Movement	Commuter Rail 398	Oceanside to Downtown San Diego (build Sorrento Mesa and UTC tunnels, add station at Balboa Avenue)	SR 56, CCT	$3,171

Figure A.6: I-5 NCC

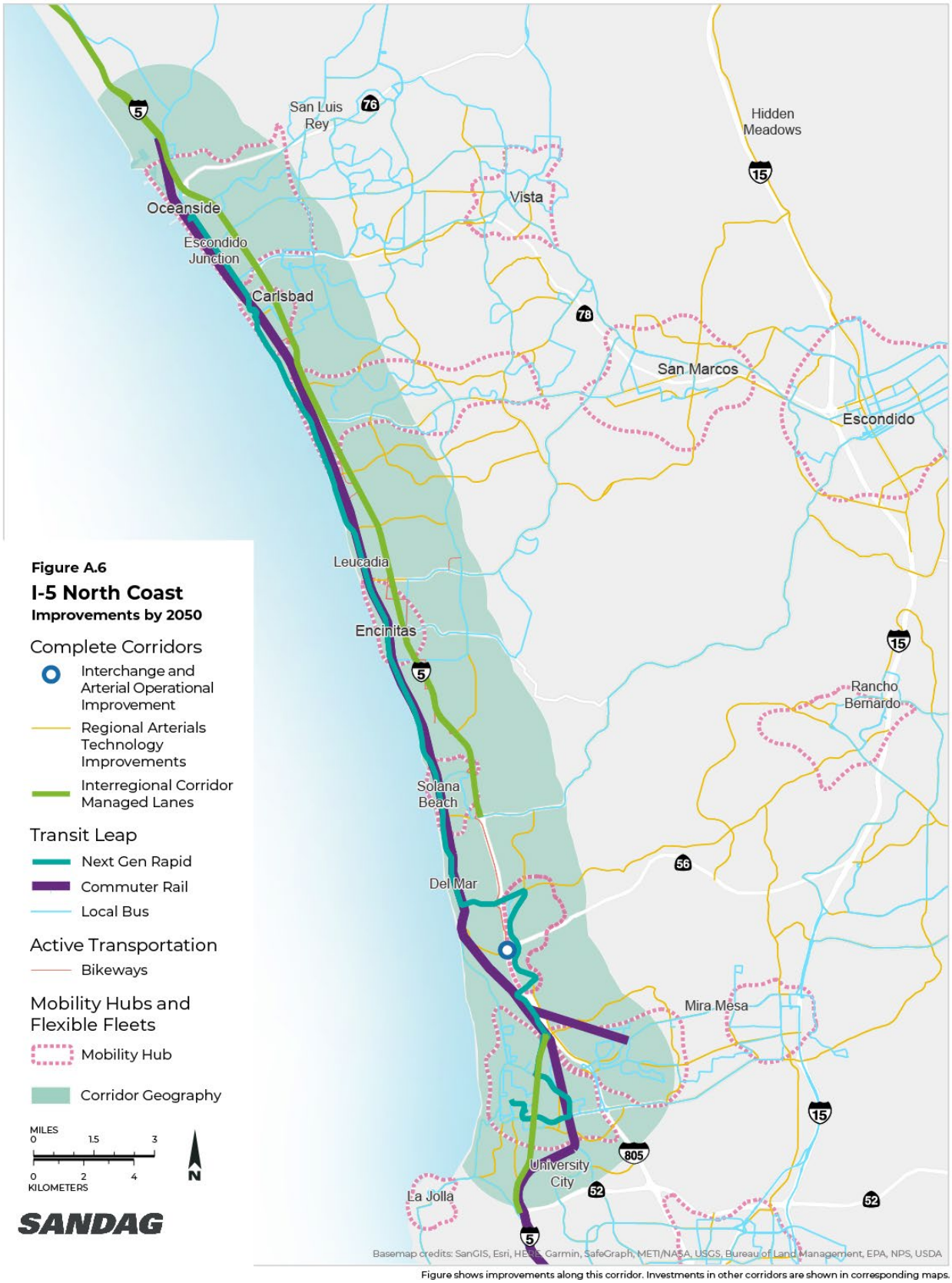

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

State Route 94 Corridor

Communities in East County rely on the SR 94 Corridor as a vital route between Mid-City, Southeast San Diego, Lemon Grove, La Mesa, El Cajon, and Downtown San Diego. This is an economically important corridor for many lower-income communities for which social equity and access to viable transportation options remain important issues. Existing transit services include the Orange Line Trolley and multiple local bus routes. The corridor provides direct access to Downtown San Diego, the third largest employment center in the region and home to the San Diego Convention Center, Petco Park and other entertainment venues; the San Diego Bay waterfront; and San Diego International Airport. This corridor connects to vital south-north travel corridors where important centers of employment are situated, such as SR 15, I-805, and high-speed commuter rail from South Bay to Sorrento Valley.

Improvements along this corridor under the 2021 Regional Plan include:

Active Transportation

Prioritized on-street bikeways in La Mesa, Southeast San Diego, and Encanto will provide more mobility options for residents and enhance regional connectivity including synchronization with the Regional Mobility Hub Network.

Complete Corridor: Managed Lanes

The introduction of MLs will improve operations for high-occupancy and transit vehicles traveling along SR 94.

Transit Leap/Mobility Hubs

Frequency enhancements on the Orange Line Trolley will facilitate greater movement of people. New mobility hubs will be streamlined with multimodal options, including access to high-speed transit (both east to west and south to north), secure bike parking, and rideshare options.

Projects in Table A.6 are organized by project type (Active Transportation, Complete Corridor: ATDM/SIS, Complete Corridor: ML, Complete Corridor: Connectors [Interchange and Arterial Operational Improvements], and Transit Leap) and by phasing period (2025, 2035, and 2050) within those project types.

Table A.6: State Route 94

State Route 94						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT018	2035	Active Transportation	Centre City – La Mesa Corridor	On-Street	I-8, SR 125, CMH, SB2S	$66
AT038	2035	Active Transportation	Downtown San Diego to Encanto	On-Street	CMH, SB2S	$11
AT039	2035	Active Transportation	Downtown to Southeast	On-Street	CMH	$3
AT041	2035	Active Transportation	Encanto, Lincoln Heights to Lemon Grove	On-Street	SR 125	$22
AT075	2050	Active Transportation	East County Northern Loop	On-Street	I-8, SR 125	$56
AT083	2050	Active Transportation	Hillcrest – El Cajon Corridor	On-Street	I-8, I-15, SB2S	$18
CC133	2025	Complete Corridor: ATDM/SIS	SR 94	SIS	N/A	$73
CC132	2035	Complete Corridor: ATDM/SIS	SR 94	ATDM	N/A	$255
CC032	2035	Complete Corridor: ML	SR 94 (I-5 to I-15)	8F to 6F+3ML	I-15, SB2S	$39
CC033	2035	Complete Corridor: ML	SR 94 (I-15 to I-805)	8F to 6F+3ML	I-15, SB2S	$23
CC034	2035	Complete Corridor: ML	SR 94 (I-805 to SR 125)	8F to 6F+3ML	I-8, I-15, SR 125, SB2S	$162
CC108	2025	Complete Corridor: Interchange and Arterial Operational improvements	SR 94 (SR 125)	South to East, including aux lane to Lemon Avenue	I-8, SR 125	$137
TL014	2035	Transit Leap	LRT 520	Orange Line (El Cajon to Downtown, double/third tracking and grade separations at Euclid Avenue, Broadway/Lemon Grove Avenue, Allison Avenue/University Avenue, and Severin Drive)	I-8, I-15, SR 125, CMH, SB2S	$274
TL015	2050	Transit Leap	LRT 520	Orange Line (El Cajon to Downtown, double/third tracking)	I-8, I-15, SR 125, CCT, CMH	$274

Figure A.7: SR 94

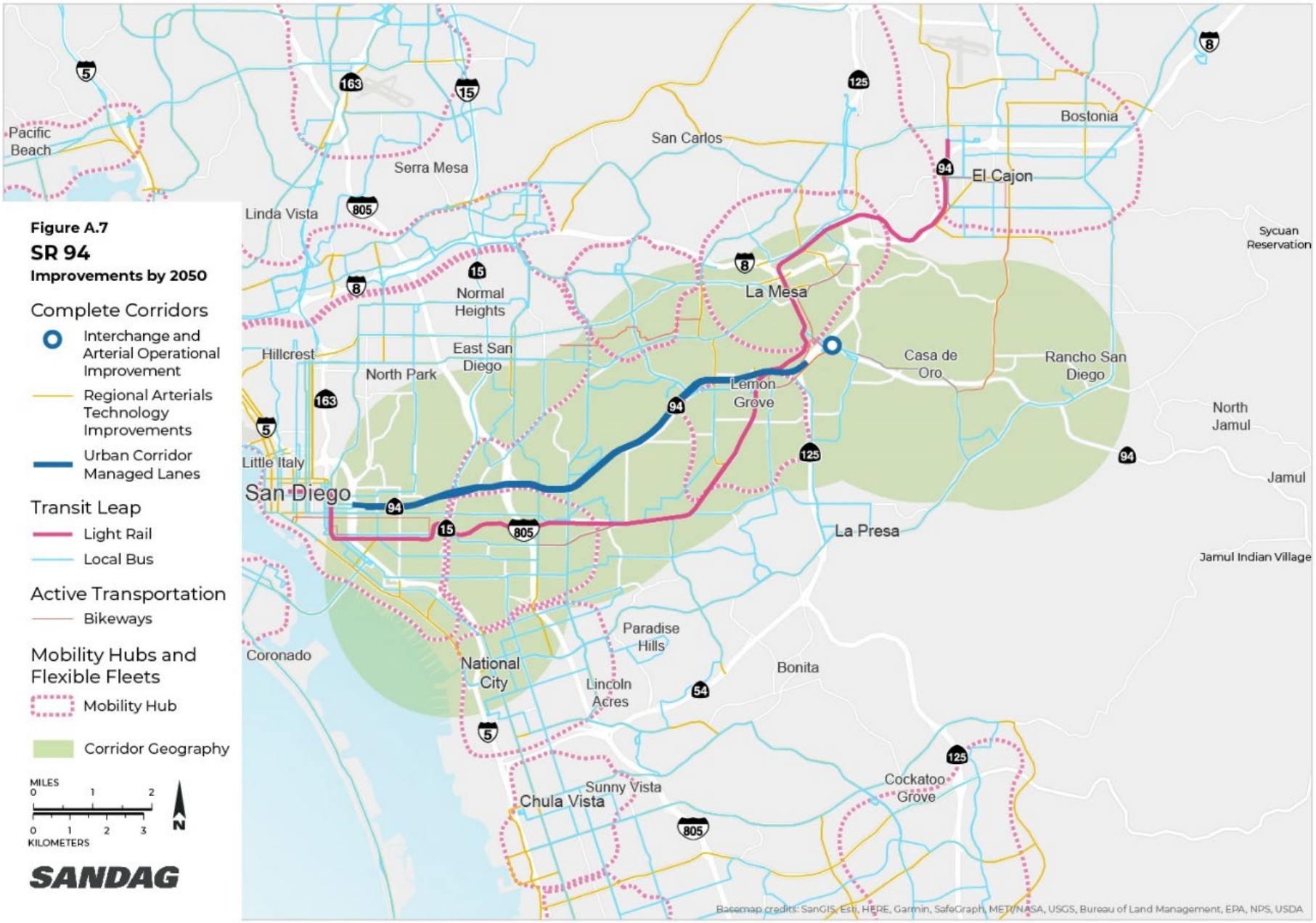

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

Interstate 8 Corridor

The I-8 Corridor is a major east-west connector for the region and links the urban, coastal areas of San Diego with the rural, mountainous, and desert regions to the east. San Diego State University, one of our region's major institutions of higher learning, is situated along this corridor in the College area. At its west end, the corridor connects travelers through Mission Valley and to the I-5 and several of the region's beach communities and other family attractions. At its east end the corridor provides travelers with access to Alpine, Pine Valley, and other east county rural communities; camping and hiking in the Laguna Mountains; Anza-Borrego Desert State Park; tribal nation lands; Imperial County; and other points east. The corridor is especially valuable for the movement of goods heading to other parts of the nation in the Southwest and beyond. Existing transit services include the Green and Orange Line Trolley and multiple local bus routes. Improvements to this corridor include the following:

Active Transportation

The 2021 Regional Plan approach for this corridor prioritizes active transportation bikeway projects in San Diego connecting residents and visitors with beach communities, jobs, and the scenic San Diego River Trail.

Complete Corridor: Active Transportation and Demand Management/Smart Intersection Systems

ATDM and SIS technology improvements will be added along the I-8 providing for some key Complete Corridors, MLs, and connectors to allow for a dynamic use of the freeway to accommodate changing roadway demands.

Transit Leap/Mobility Hubs

Communities will benefit from the development of an east-west commuter rail route that will connect El Cajon to the main campus at San Diego State University, urban communities in City Heights and University Heights, and the future Central Mobility Hub. Enhancements to existing Trolley services and Next Generation *Rapid* transit routes in this corridor will provide competitive alternatives to private auto travel and be connected via the Regional Mobility Hub Network. These new connectivity centers feature streamlined multimodal options and include access to high-speed transit, secure bike parking, and rideshare options.

Projects in Table A.7 are organized by project type (Active Transportation, Complete Corridor: ATDM/SIS, Complete Corridor: ML/Goods Movement, Complete Corridor: Connectors [MLC], and Transit Leap) and by phasing period (2025, 2035, and 2050) within those project types.

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Table A.7: Interstate 8

Interstate 8						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT043	2035	Active Transportation	Hillcrest – El Cajon Corridor	On-Street	SR 94, SR 125	$26
AT050	2035	Active Transportation	Kearny Mesa to Beaches Corridor – Clairemont Drive (Mission Bay to Burgener)	On-Street	N/A	$6
AT056	2035	Active Transportation	San Diego River Bikeway Connections	Off-Street	N/A	$16
AT060	2035	Active Transportation	San Diego River Trail – I-805 to Fenton Parkway	Off-Street	I-15, SB2S	$5
AT062	2035	Active Transportation	San Diego River Trail – Qualcomm Stadium to Ward Road	Off-Street	I-15	$2
AT063	2035	Active Transportation	San Diego River Trail – Qualcomm Way to I-805	Off-Street	I-15, SB2S	$3
AT103	2050	Active Transportation	La Mesa Regional Bike Network Connector	On-Street	SR 94	$2
AT112	2050	Active Transportation	San Diego River Bikeway Connections	Off-Street	CCT, CMH	$11
AT114	2050	Active Transportation	Santee – El Cajon Corridor	On-Street	SR 125, CCT	$16
CC125	2025	Complete Corridor: ATDM/SIS	I-8	SIS	N/A	$94
CC124	2035	Complete Corridor: ATDM/SIS	I-8	ATDM	N/A	$396
CC024	2035	Complete Corridor: ML/ Goods Movement	I-8 (I-805 to College Avenue)	8F to 6F+4ML	I-15, SB2S	$161
CC025	2035	Complete Corridor: ML/ Goods Movement	I-8 (College Avenue to Johnson Avenue)	8F to 6F+4ML	SR 94, SR 125	$281
CC026	2035	Complete Corridor: ML/ Goods Movement	I-8 (Johnson Avenue to Mollison Avenue)	6F to 4F+4ML	SR 125, CCT	$48
CC027	2035	Complete Corridor: ML/ Goods Movement	I-8 (Mollison Avenue to Greenfield Drive)	4F/6F to 4F+4ML	N/A	$106
CC023	2050	Complete Corridor: ML/ Goods Movement	I-8 (I-5 to I-805)	8F to 6F+4ML	I-15, SB2S	$179
CC067	2050	Complete Corridor: MLC	I-5 (I-8)	South to East and West to North	CMH	$202
CC068	2050	Complete Corridor: MLC	I-5 (I-8)	North to East and West to South	CMH	$202

Interstate 8						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
TL19	2025	Transit Leap	*Rapid* 10 Phase 1	La Mesa to Ocean Beach via Mid-City, Hillcrest, Old Town (light version of *Rapid*)	I-15, CMH, SR 94, SR 125, SB2S	$36
TL16	2035	Transit Leap	LRT 530	Green Line (Santee to Downtown, double/third tracking and grade separations)	I-15, SR 94, SR 125, CCT, CMH, SB2S	$384
TL20	2035	Transit Leap	*Rapid* 10 Phase 2	La Mesa to Ocean Beach via Mid-City, Hillcrest, Central Mobility Hub (full version of *Rapid*)	I-15, SR 94, SR 125, CMH, S2BS	$146
TL01	2050	Transit Leap	Commuter Rail 581	581: Downtown to El Cajon via SDSU and La Mesa 581B: Central Mobility Hub to El Cajon via SDSU and La Mesa	I-15, SR 94, SR 125, CMH, SB2S	$9,774
TL17	2050	Transit Leap	LRT 530	Green Line (Santee to Downtown, double/third tracking and grade separations)	I-15, SR 94, SR 125, CCT, CMH, SB2S	$384

Figure A.8: I-8

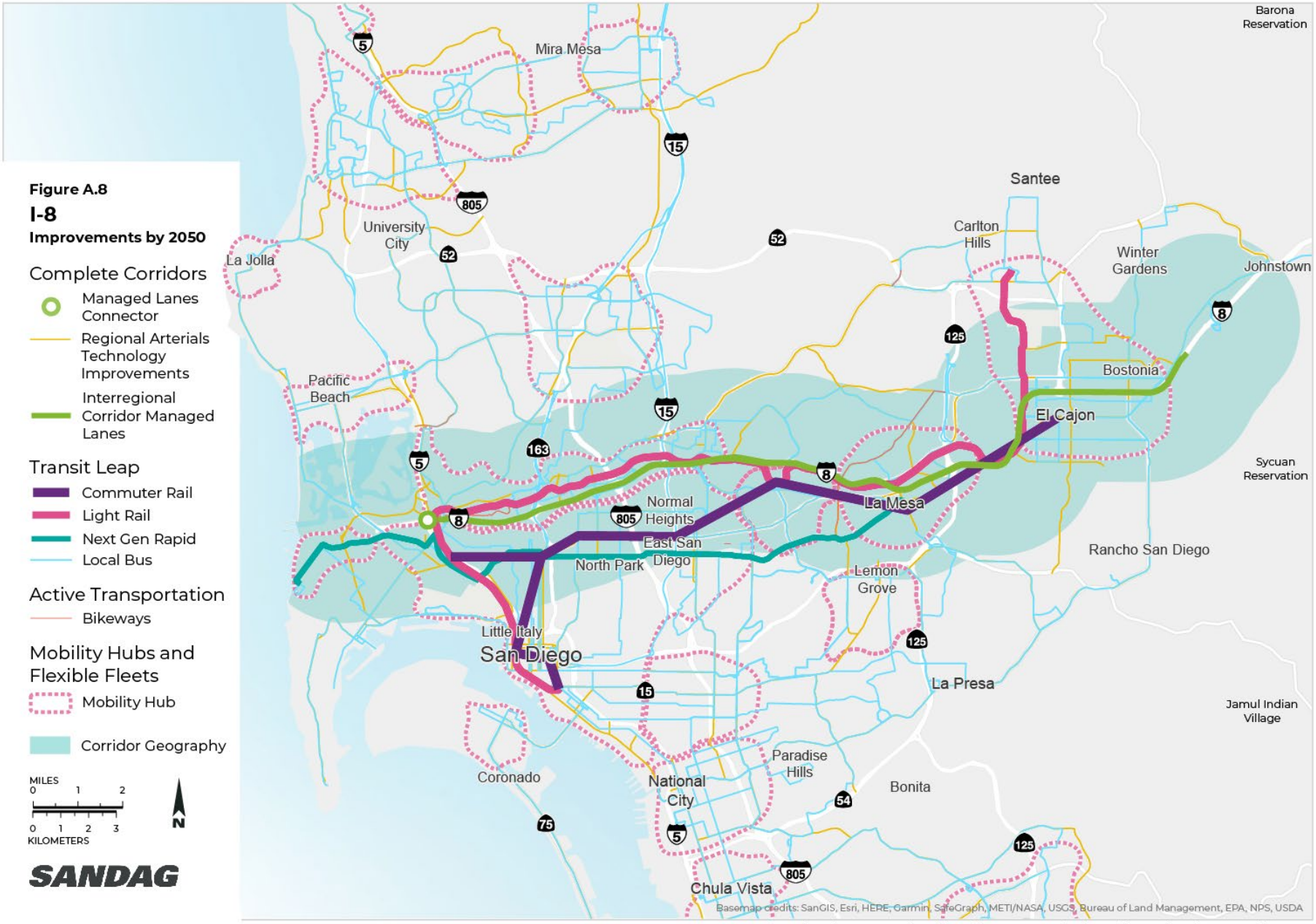

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

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Coast, Canyons, and Trails Corridor

The Coast, Canyons, and Trails Corridor crosses the cities of San Diego, Santee, and El Cajon, as well as unincorporated areas of the County of San Diego. Major transportation facilities in this corridor include SR 52, portions of SR 67, and their connections with I-5, I-8, I-805, SR 163, I-15, and SR 125. This corridor connects two major employment centers—Kearny Mesa and University City/Sorrento Valley—with east San Diego County and activity centers that include Marine Corps Air Station Miramar, universities, recreational areas, and shopping centers. Improvements planned for this corridor include the following:

Active Transportation

Significant investments in active transportation are also planned, with six new off-street and five on-street bikeways. These bikeways will improve access to numerous destinations in the corridor, including the San Diego River trail, beaches, hiking trails, and parks situated along and near the transportation corridor such as Marian Bear Memorial Park and Mission Trails Regional Park.

Complete Corridor: Managed Lanes and Transit Leap/Mobility Hubs

Travel along this corridor will be increasingly multimodal as MLs and four new *Rapid* routes are put into service. Mobility hubs in Santee, Kearny Mesa, and La Jolla will help provide travelers with first- and last-mile connections to transit services and offer additional travel options for local trips.

Projects in Table A.8 are organized by project type (Active Transportation, Complete Corridor: ATDM/SIS, Complete Corridor: ML, Complete Corridor: Connectors [MLC], and Transit Leap) and by phasing period (2025, 2035, and 2050) within those project types.

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Table A.8: Coast, Canyons, and Trails

Coast, Canyons, and Trails						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT009	2025	Active Transportation	San Diego River Trail: Carlton Oaks Segment	Off-Street	N/A	$19
AT023	2035	Active Transportation	Coastal Rail Trail – Rose Canyon	Off-Street	SB2S	$31
AT059	2035	Active Transportation	San Diego River Trail – Father Junipero Serra Trail to West Hills Parkway	On-Street	N/A	$17
AT061	2035	Active Transportation	San Diego River Trail – Mast Park to Lakeside baseball park	Off-Street	N/A	$30
AT065	2035	Active Transportation	Santee – El Cajon Corridor – Forester Creek Connection	Off-Street	N/A	$4
AT081	2050	Active Transportation	Gilman Connector	On-Street	N/A	$2.8
AT094	2050	Active Transportation	I-8 Corridor – San Diego River Trail to Olde Highway 80	On-Street	N/A	$30
AT099	2050	Active Transportation	Kearny Mesa to Beaches Corridor – Clairemont Drive to Genesee Avenue	On-Street	N/A	$14
AT110	2050	Active Transportation	Pacific Beach to Mission Beach	On-Street	N/A	$13
AT119	2050	Active Transportation	SR 52 Bikeway – I-5 to Santo Road	Off-Street	I-15, SB2S	$82
AT120	2050	Active Transportation	SR 52 Bikeway – SR 52/Mast Drive to San Diego River Trail	Off-Street	N/A	$6
CC131	2025	Complete Corridor: ATDM/SIS	SR 52	SIS	N/A	$30
CC130	2035	Complete Corridor: ATDM/SIS	SR 52	ATDM	N/A	$155
CC029	2035	Complete Corridor: ML	SR 52 (I-805 to I-15)	6F to 4F+3ML	I-15	$92
CC030	2035	Complete Corridor: ML	SR 52 (I-15 to Mast Boulevard)	6F to 4F+3ML	I-15	$153
CC031	2035	Complete Corridor: ML	SR 52 (Mast Boulevard to SR 125)	4F to 4F+3ML	N/A	$103
CC028	2050	Complete Corridor: ML	SR 52 (I-5 to I-805)	4F to 4F+3ML	SB2S	$214
CC065	2050	Complete Corridor: MLC	I-5 (SR 52)	South to East and West to North	N/A	$202
CC066	2050	Complete Corridor: MLC	I-5 (SR 52)	North to East and West to South	N/A	$202

Coast, Canyons, and Trails						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
TL32	2025	Transit Leap	*Rapid* 292 Phase 1	Pacific Beach to Kearny Mesa (light version of *Rapid*)	I-15, SB2S	$7
TL24	2035	Transit Leap	*Rapid* 30	Balboa Station to Sorrento Mesa via Pacific Beach, La Jolla, UTC	SB2S	$189
TL50	2035	Transit Leap	*Rapid* 870	El Cajon to UTC via Santee, SR 52, I-805	I-8, I-15, SR 125, SB2S	$62
TL51	2035	Transit Leap	*Rapid* 890	El Cajon to Sorrento Mesa via Santee, SR 52, I-805	I-5 NCC, I-8, I-15, SR 125, SB2S	$107

Note: The Coast, Canyons, and Trails Comprehensive Multimodal Corridor Plan is completing a more detailed analysis of SR 52 between I-5 and I-805 and the connections at SR 52 and I-5. Improvements for this segment are envisioned to be within the existing corridor footprint where the MLs would be designed through repurposing the existing shoulders and landscaped median.

Figure A.9: Coast, Canyons, and Trails

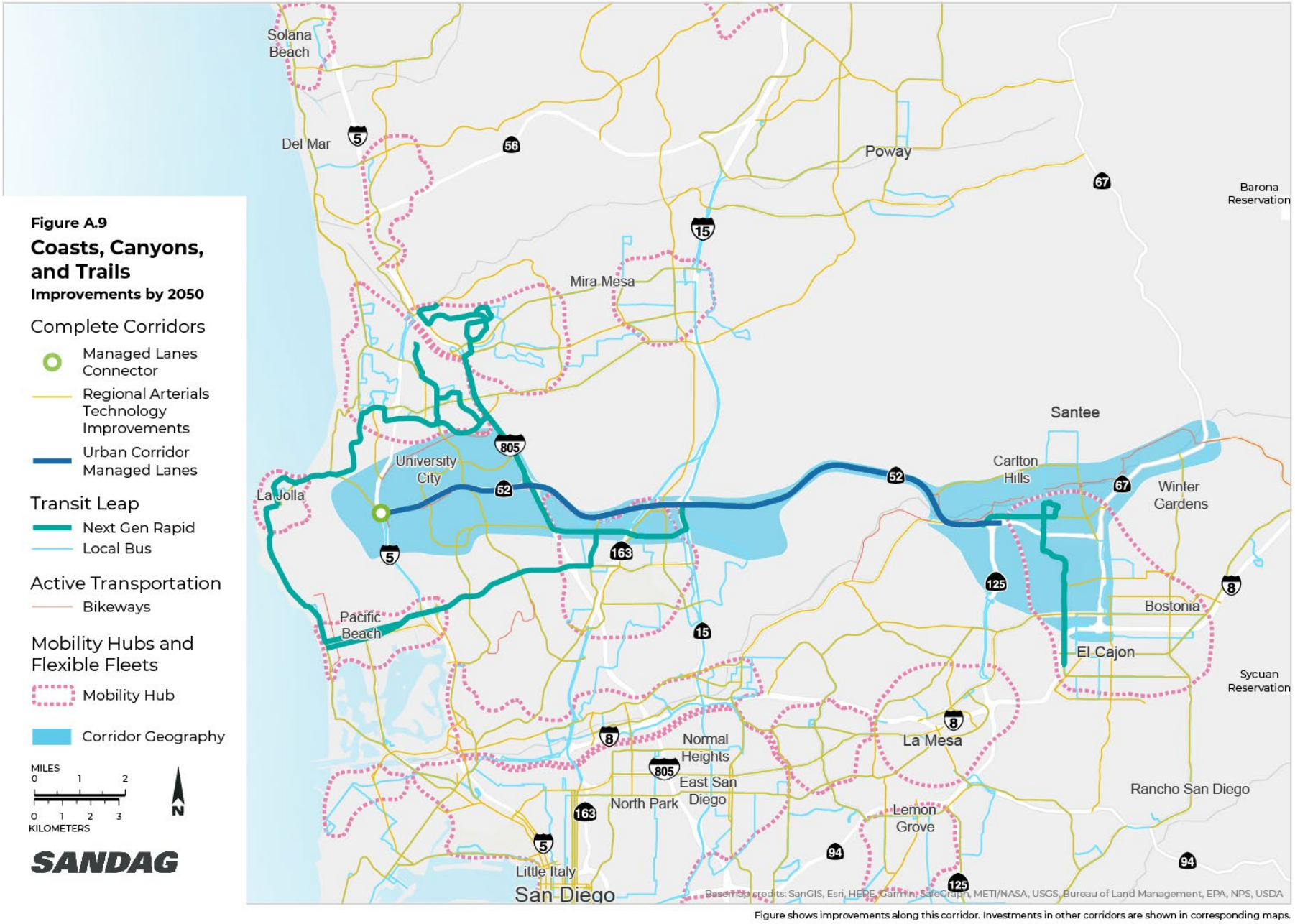

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

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State Route 56 Corridor

The SR 56 Corridor connects the northern end of Sorrento Valley to numerous residential communities. Primary access is via SR 56 between I-5 and I-15, with local roadways connecting to Carmel Valley. The SR 56 Bikeway functions as a commuter and recreational route. Sorrento Valley is the largest employment center in San Diego County, making the SR 56 Corridor an important part of the regional economy. There are currently no multimodal options at the west end of the corridor, so planned investments in Transit Leap and ML improvements will have significant impacts in relieving congestion in this economically important part of our region.

Improvements include the following:

Active Transportation

The construction of the SR 56 Bikeway from Azuaga Street to Rancho Peñasquitos Boulevard is planned.

Complete Corridor: Managed Lanes

The 2021 Regional Plan slates this corridor for improvement through the construction of MLs.

Transit Leap/Mobility Hubs

Two new *Rapid* transit routes, the Mid-County Bikeway – Coastal Rail Trail connection. A mobility hub at the western end of the corridor will provide first- and last-mile connections to Transit Leap services and offer additional travel options for local trips. A mobility hub at the northeastern end of the corridor will also provide access to the transportation system. These hubs are shown in Table A.14 and Figure A.3 as part of the Regional Mobility Hub Network.

Projects in Table A.9 are organized by project type (Active Transportation, Complete Corridor: ATDM/SIS, Complete Corridor: ML, Complete Corridor: ML/Goods Movement, and Transit Leap) and by phasing period (2025, 2035, and 2050) within those project types.

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Table A.9: State Route 56

State Route 56						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT104	2050	Active Transportation	Mid-County Bikeway – Coastal Rail Trail connection	On-Street	N/A	$34
AT121	2050	Active Transportation	SR 56 Bikeway – Azuaga Street to Rancho Peñasquitos Boulevard	Off-Street	I-15	$6
CC129	2025	Complete Corridor: ATDM/SIS	SR 56	SIS	N/A	$16
CC128	2035	Complete Corridor: ATDM/SIS	SR 56	ATDM	N/A	$84
CC035	2050	Complete Corridor: ML	SR 56 (I-5 to I-15)	4F to 4F+3ML	I-15	$549
CC006	2050	Complete Corridor: ML/ Goods Movement	I-5 (SR 56 to Via de La Valle)	8F/10F+2HOV to 6F/8F+4ML	I-5 NCC	$37
TL026	2050	Transit Leap	*Rapid* 103	Solana Beach to Sabre Springs via Del Mar Heights and SR 56	I-15	$53
TL027	2050	Transit Leap	*Rapid* 104	Sorrento Valley to Sabre Springs via SR 56	I-15, SB2S	$11

Figure A.10: SR 56

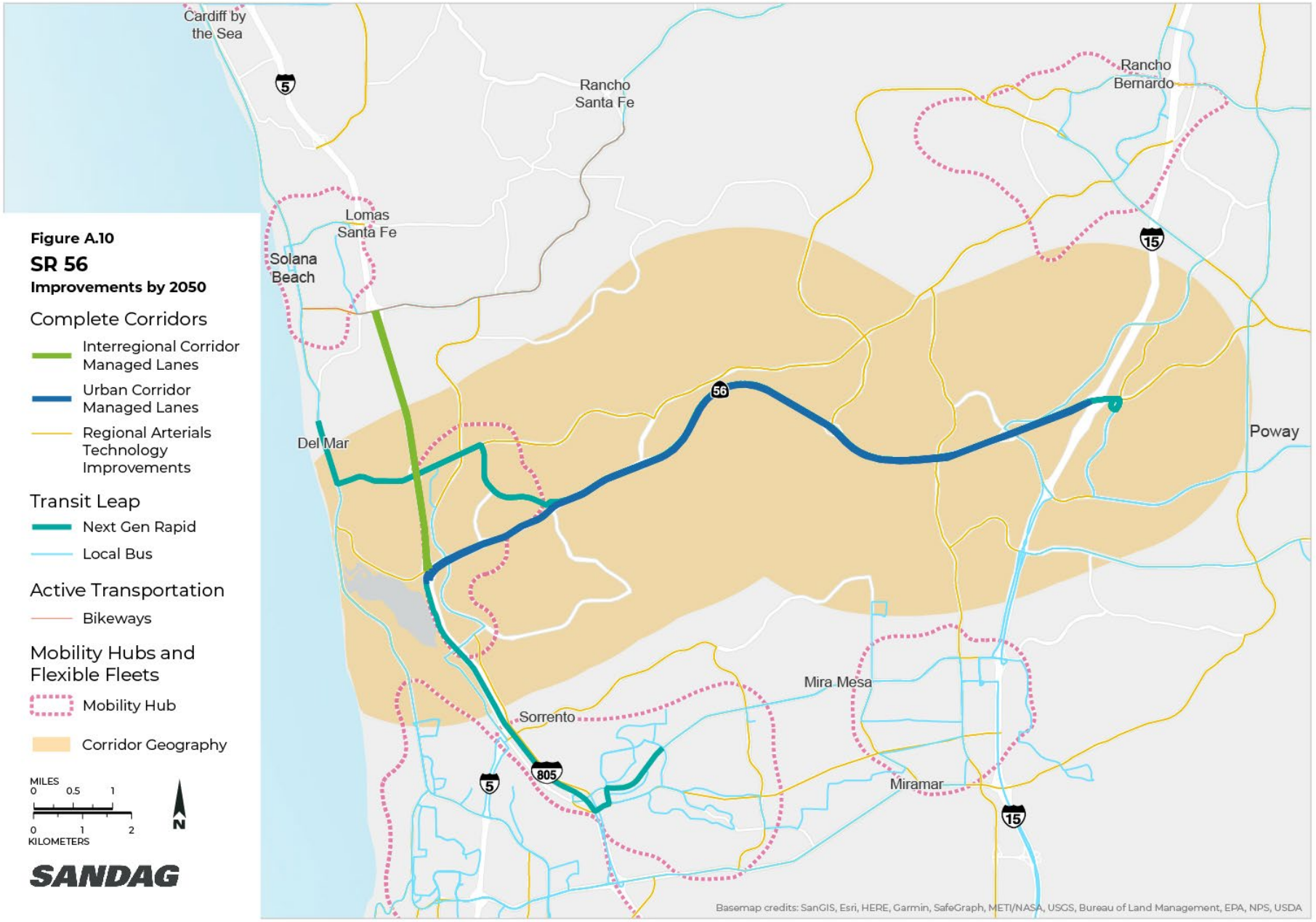

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

San Vicente Corridor

The San Vicente Corridor passes through the City of Poway, unincorporated areas of San Diego County (the communities of Ramona and Lakeside), and the Barona Indian Reservation. Major roadways include SR 67 from Mapleview Street in Lakeside to SR 78 in Ramona, SR 78 within the Ramona Community Plan Area, Wildcat Canyon Road, and other arterials including road connections to tribal lands.

Transportation improvements in the 2021 Regional Plan focus on improving transportation safety, increasing options for emergency evacuations, preserving the area's rural character, and making trips more reliable and efficient. The 2021 Regional Plan prioritizes safety, as well as technology and operational improvements that minimize impacts on environmental habitats and wildlife, primarily on SR 67.

Complete Corridor: Active Transportation and Demand Management/Smart Intersection Systems

ATDM improvements along this corridor include the application of technology that can improve driver behavior by providing motorists with real time roadway conditions including speeds, roadway visibility conditions, and other information that can reduce dangerous driving maneuvers and prevent secondary crashes. The 2021 Regional Plan also will implement dynamic lane assignment routing and traveler information technology during emergencies, to provide first responders with rapid access to those in need and to make evacuations safer and more efficient.

Complete Corridor: Rural

Other improvements include an expansion in broadband network infrastructure to provide residents, businesses, and tribal areas along this corridor with the digital connectivity they need for efficient travel and in emergencies. Access to broadband connectivity is essential for people to access high-quality internet services, and it is a critical component in the overall effort to use technology to make travel safer and more efficient. The 2021 Regional Plan supports the expansion of Flexible Fleets along the San Vicente Corridor by enabling residents in communities along the corridor to access technology-enabled mobility services such as ride-hailing and microtransit. These transportation services will connect travelers to numerous destinations, or to Transit Leap services at the El Cajon Mobility Hub.

Projects in Table A.10 are organized by project type (Complete Corridor: ATDM/SIS and Complete Corridor: Rural) and by phasing period (2025, 2035, and 2050) within those project types.

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Table A.10: San Vicente

San Vicente						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
CC143	2025	Complete Corridor: ATDM/SIS	SR 67	SIS	N/A	$26
CC142	2035	Complete Corridor: ATDM/SIS	SR 67	ATDM	N/A	$74
CC050	2035	Complete Corridor: Rural	SR 67 (Mapleview to Dye Road)	Shoulder Widening/ Straightening	N/A	$206
CC061	2050	Complete Corridor: Rural	SR 78 (Deer Canyon Road to Santa Ysabel)	Intersection Improvements	N/A	$4

Figure A.11: San Vicente

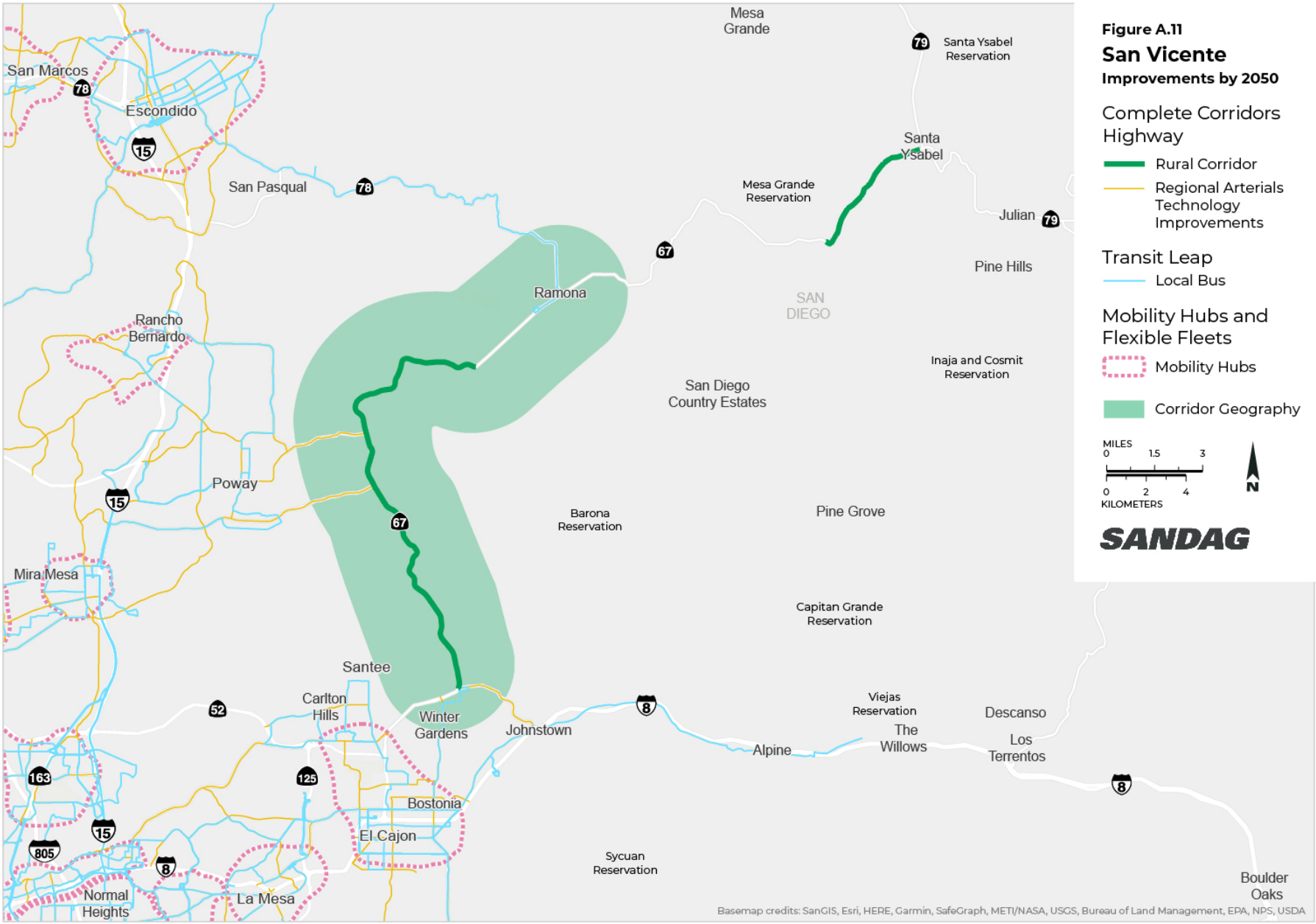

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

North County Corridor

The North County Corridor stretches from the region's North County beaches to its inland valleys and covers the cities of Oceanside, Vista, Carlsbad, San Marcos, and Escondido. It also includes unincorporated areas of San Diego County. Major transportation infrastructure in this area includes the SPRINTER light rail between the Oceanside and Escondido transit centers; major local arterials, such as Palomar Airport Road, that connect residential neighborhoods with centers of employment and major highways including SR 78 between I-5 and I-15; and western portions of SR 76. This corridor also includes the Inland Rail Trail bike path between Oceanside and Escondido. New mobility hubs situated along this corridor, and served by flexible fleets, will be vital for offering travelers numerous mobility options for the shorter trips they frequently take in this part of the region.

Improvements for this corridor include the following:

Active Transportation

Additions to the Coastal Rail Trail, Inland Rail Trail, San Luis Rey River Trail, and on-street bikeways will contribute to reduced greenhouse gas emissions related to travel in the corridor.

Complete Corridor: Managed Lanes and Goods Movement

Improvements to SR 78 include the construction of MLs by 2035 supported by MLCs and interchange and arterial improvements to improve access and travel in North County.

Transit Leap/Mobility Hubs

The 2021 Regional Plan approach to the North County Corridor is to greatly expand transit offerings, while enhancing existing SPRINTER service. Numerous *Rapid* routes and an extension of the SPRINTER light rail will provide access to North County employment, activity centers, and mobility hubs.

Projects in Table A.11 are organized by project type (Active Transportation, Complete Corridor: ATDM/SIS, Complete Corridor: ML, Complete Corridor: Connectors [Interchange and Arterial Operational Improvements, MLC], and Transit Leap) and by phasing period (2025, 2035, and 2050) within those project types.

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Table A.11: North County

North County						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
AT003	2025	Active Transportation	Inland Rail Trail: Phase 4	Off-Street	N/A	$37
AT024	2035	Active Transportation	Coastal Rail Trail Carlsbad	Off-Street	I-5 NCC	$6
AT025	2035	Active Transportation	Coastal Rail Trail Carlsbad – Reach 3 Tamarack to Cannon	Off-Street	I-5 NCC	$11
AT026	2035	Active Transportation	Coastal Rail Trail Carlsbad – Reach 4 Cannon to Palomar Airport Road	Off-Street	I-5 NCC	$8
AT027	2035	Active Transportation	Coastal Rail Trail Carlsbad – Reach 5 Palomar Airport Road to Poinsettia Station	Off-Street	I-5 NCC	$9
AT030	2035	Active Transportation	Coastal Rail Trail Oceanside – Loma Alta Marsh Bridge	Off-Street	I-5 NCC	$4
AT031	2035	Active Transportation	Coastal Rail Trail Oceanside – Broadway to Eaton	Off-Street	I-5 NCC	$1
AT049	2035	Active Transportation	Inland Rail Trail: Oceanside	Off-Street	I-5 NCC	$68
AT068	2050	Active Transportation	Camp Pendleton Trail	On-Street	N/A	$96
AT069	2050	Active Transportation	Carlsbad – San Marcos Corridor	On-Street	N/A	$61
AT074	2050	Active Transportation	Coastal Rail Trail – Oceanside Segment 1 ALT	On-Street	N/A	$6
AT077	2050	Active Transportation	El Camino Real	On-Street	I-5 NCC	$120
AT078	2050	Active Transportation	Encinitas – San Marcos Corridor	On-Street	I-5 NCC	$41
AT079	2050	Active Transportation	Encinitas to San Marcos Corridor – Double Peak Drive to San Marcos Boulevard	Off-Street	N/A	$30
AT106	2050	Active Transportation	Mid-County Bikeway – Rancho Santa Fe Segment	On-Street	I-15	$53
AT113	2050	Active Transportation	San Luis Rey River Trail	Off-Street	I-15	$97
AT124	2050	Active Transportation	Vista Way Connector	On-Street	N/A	$27
CC127	2025	Complete Corridor: ATDM/SIS	SR 78	SIS	N/A	$112

North County						
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Connecting Corridor(s)**	**Cost ($2020) Millions**
CC126	2035	Complete Corridor: ATDM/SIS	SR 78	ATDM	N/A	$388
CC036	2035	Complete Corridor: ML	SR 78 (I-5 to Twin Oaks)	6F to 4F+4ML+Connectors	N/A	$507
CC037	2035	Complete Corridor: ML	SR 78 (Twin Oaks to I-15)	6F to 4F+4ML	I-15	$145
CC105	2035	Complete Corridor: Interchange and Arterial Operational Improvements	I-5 (SR 78)	South to East and West to South	N/A	$379
CC064	2035	Complete Corridor: MLC	I-5 (SR 78)	South to East and West to North, North to East and West to South	N/A	$352
TL37	2025	Transit Leap	*Rapid* 450 Phase 1	Oceanside to Escondido via Palomar Airport Road and SR 78 (light version of *Rapid*)	I-5 NCC, I-15	$8
TL10	2035	Transit Leap	LRT 399	SPRINTER (Oceanside to Escondido, double-tracking and grade separations at El Camino Real, Melrose Drive, Vista Village Drive/ Main Street, North Drive, Civic Center, Auto Parkway and Mission Avenue)	I-15	$376
TL36	2035	Transit Leap	*Rapid* 440	Carlsbad to Escondido Transit Center via Palomar Airport Road	I-5 NCC, I-15	$71
TL38	2035	Transit Leap	*Rapid* 450 Phase 2	Oceanside to Escondido via Palomar Airport Road and SR 78 (full version of *Rapid*)	I-5 NCC, I-15	$31
TL39	2035	Transit Leap	*Rapid* 471	Downtown Escondido to East Escondido	I-15	$85
TL41	2035	Transit Leap	*Rapid* 474	Oceanside to Vista via Mission Avenue/ Santa Fe Road Corridor	I-5 NCC	$71
TL42	2035	Transit Leap	*Rapid* 477	Carlsbad Village to SR 76 via College Boulevard, Plaza Camino Real	I-5 NCC	$108
TL11	2050	Transit Leap	LRT 399	SPRINTER (Oceanside to Escondido, extension to North County Fair)	I-5 NCC, I-15	$376

Figure A.12: North County

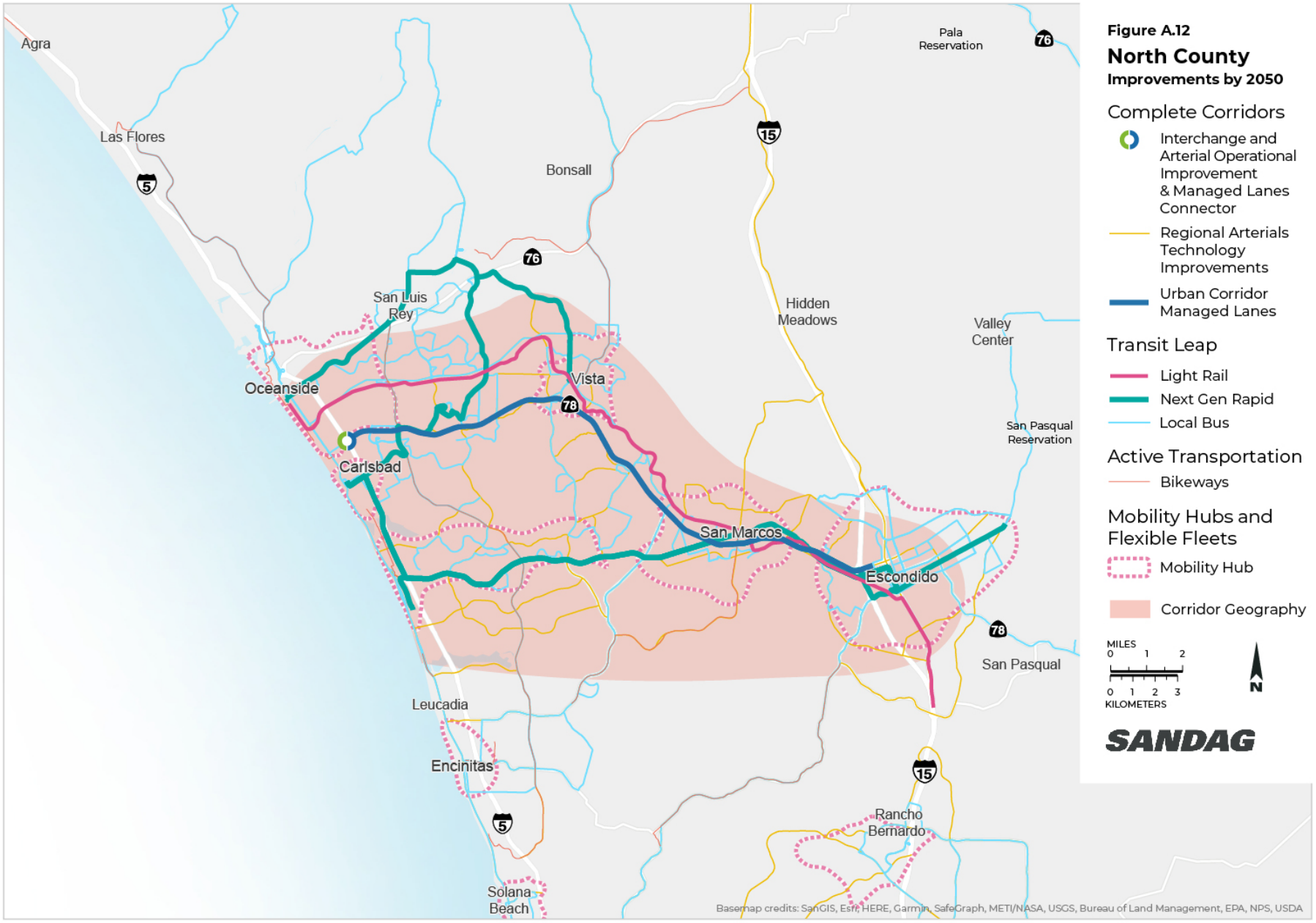

Figure shows improvements along this corridor. Investments in other corridors are shown in corresponding maps.

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Rural Corridors

Rural corridors, mostly located along state routes traversing the eastern two-thirds of the region, provide people access to rural towns and lands, as well as connectivity to the interstate system, as shown in Figure A.13. Rural corridors are economic lifelines for rural communities and the region's many tribal nations. Rural corridors provide access to jobs, education, and healthcare, as well as needed infrastructure for the movement of goods, deliveries, and emergency vehicles. Improvements for rural corridors include the following:

Complete Corridor: Rural

Along I-8 in East County, projects included in the 2021 Regional Plan benefit interchanges to this freeway with substantial safety improvements for SR 94, SR 76, and SR 79 and other state routes. Physical safety improvements are realized with a variety of projects including shoulder widening and curve straightening. Our rural and tribal communities also need new investments in broadband infrastructure. This infrastructure is an essential part of the transportation technology envisioned along rural corridors, by providing travelers with real-time travel information and enabling access to Flexible Fleet options such as shuttles and other on-demand transportation services. But it will not only improve mobility along rural corridors; it will enable residents to work remotely, learn online, and conduct other business over the internet. Most of these projects, and their associated costs, are derived from the Intraregional Tribal Transportation Study[5] and are shown in Table A.12. Rural corridor improvements for the SR 67 can be found in the San Vicente Major Corridor Table A.10.

Complete Corridor: Active Transportation and Demand Management/Smart Intersection Systems

Technology enhancements such as ATDM, as well as SIS are also aimed at improving safety. These improvements provide people with a variety of benefits, including expediting the movement of goods to rural communities during disaster recovery efforts. Projects related to ATDM will provide motorists with real time roadway conditions, including speeds, roadway visibility conditions, and other tactical information. Smart sensors, closed circuit television cameras, changeable message signs, and traffic detection equipment will all help provide people with a safer environment to walk and bike, while also adding the capability to prioritize the movement of freight or emergency vehicles along a rural corridor.

Transportation Improvements identified for each of the rural corridors in Table A.12 are listed by Corridor (I-8, SR 76, SR 79, and SR 94), by project type (Active Transportation, Complete Corridor: Rural Corridor, and Complete Corridor: ATDM/SIS), and by phasing period (2025, 2035, and 2050) within those project types.

[5] The Intraregional Tribal Transportation Study can be found at sandag.org/itts or in Appendix EE.

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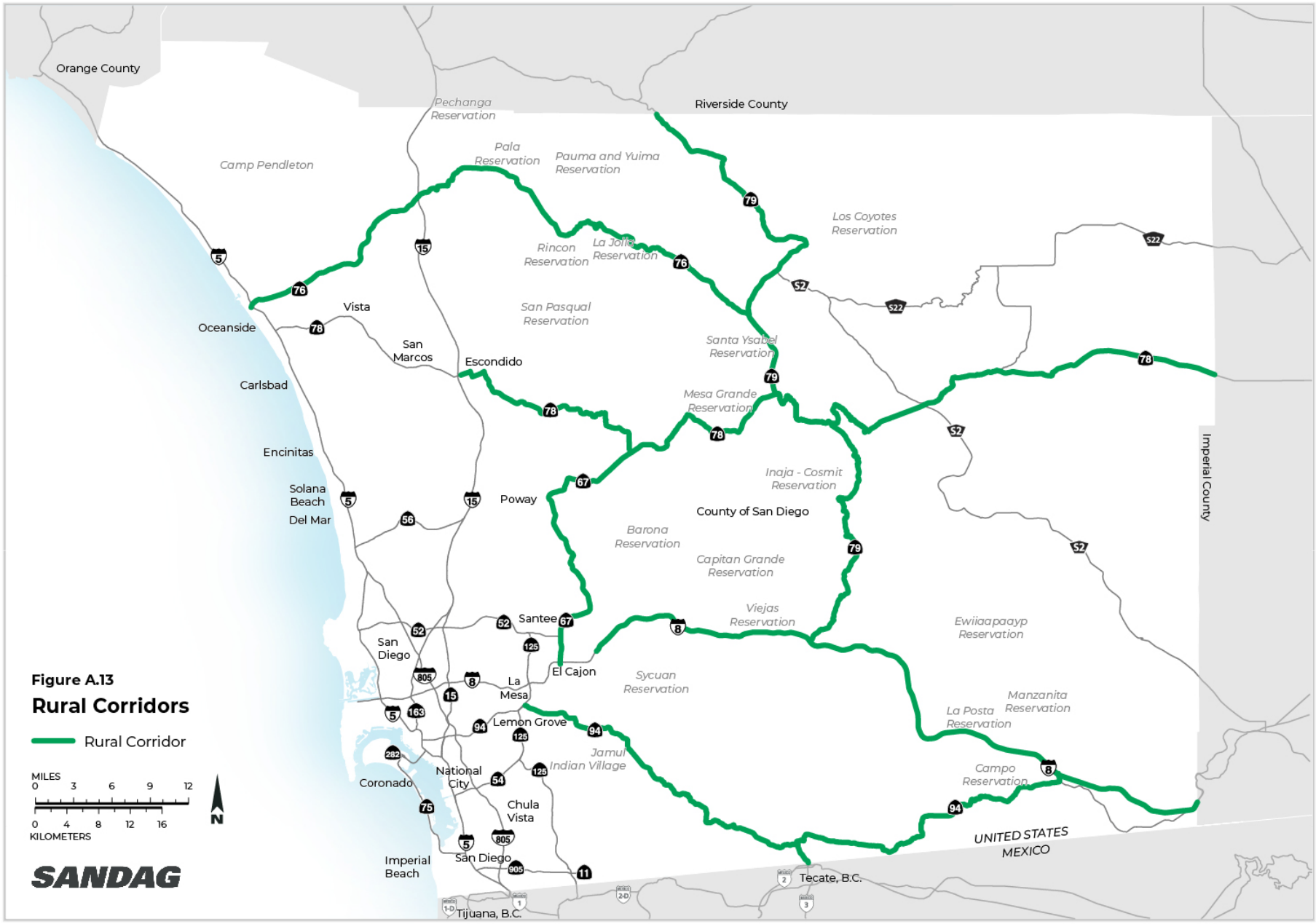
Table A.12: Rural Corridors

Rural Corridors					
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Cost ($2020) Millions**
AT092	2050	Active Transportation	I-8 Corridor – Lake Jennings Park Road to Dunbar Lane	On-Street	$23
AT093	2050	Active Transportation	I-8 Corridor – Olde Highway 80 to Willows Road	On-Street	$55
AT095	2050	Active Transportation	I-8 Corridor – Willows Road to SR 79	On-Street	$22
CC047	2035	Complete Corridor: Rural	I-8 (I-8 to West Willows Road)	Interchange Improvements	$11
CC048	2050	Complete Corridor: Rural	I-8 (I-8 to East Willows Road)	Interchange Improvements	$11
CC052	2035	Complete Corridor: Rural	SR 76 (Rice Canyon Road to Pala Reservation)	Straightening	$60
CC055	2035	Complete Corridor: Rural	SR 76 (SR 76 to Cole Grade Road)	Intersection Improvements	$1
CC057	2035	Complete Corridor: Rural	SR 76 (SR 76 to Pauma Reservation Road)	Intersection Improvements	$1
CC058	2035	Complete Corridor: Rural	SR 76 (Pala Casino to Rice Canyon Road)	Facility Improvements	$1
CC051	2050	Complete Corridor: Rural	SR 76 (SR 79 to Valley Center Road)	Facility Improvements	$693
CC053	2050	Complete Corridor: Rural	SR 76 (Harolds Road to Pauma Rancho)	Straightening	$21
CC054	2050	Complete Corridor: Rural	SR 76 (SR 76 to Pala Mission Road)	Intersection Improvements	$1
CC056	2050	Complete Corridor: Rural	SR 76 (West Reservation Boundary to East Reservation Boundary)	Shoulder Widening	$40
CC145	2025	Complete Corridor: ATDM/SIS	SR 76	SIS	$55
CC144	2035	Complete Corridor: ATDM/SIS	SR 76	ATDM	$159
CC060	2035	Complete Corridor: Rural	SR 79 (SR 79 to Schoolhouse Canyon Road)	Intersection Improvements	$1
CC059	2050	Complete Corridor: Rural	SR 79 (Deer Canyon Road to San Felipe Road)	Shoulder Widening	$226
CC147	2025	Complete Corridor: ATDM/SIS	SR 79	SIS	$14
CC146	2035	Complete Corridor: ATDM/SIS	SR 79	ATDM	$40
CC049	2035	Complete Corridor: Rural	SR 94 (SR 94 to Melody Road/Daisy Drive)	Intersection Improvements	$8
CC062	2050	Complete Corridor: Rural	SR 94 (Jamul Reservation to Tecate Road)	Shoulder Widening/ Straightening	$252

Figure A.13: Rural Corridors



Arterials

Local jurisdictions such as the cities of San Diego, San Marcos, Carlsbad, Chula Vista, National City, Oceanside, Escondido, and the County of San Diego will drive the completion of Complete Streets efforts along significant arterials (major through streets that connect the freeway system). These projects are listed in Table A.13 with their 2021 Regional Transportation Improvement Program (RTIP—SANDAG's programming document) ID numbers and are a part of the air quality conformity analysis for programmatic purposes (see Appendix C: Air Quality Planning and Transportation Conformity).

SANDAG supports and encourages Complete Streets implementation along these corridors to be designed and operated to enable safe access for all users and can accommodate people of all ages and abilities, traveling by all modes, including walking, biking, using public transit, and driving cars or commercial vehicles. Projects that are part of the Regional Arterial System (RAS) are indicated in the table. The RAS is further described in Appendix T: Network Development and Performance.

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Table A.13: Arterials

Arterials					
TIP ID	**Year Built**	**Lead**	**Project Name**	**Category**	**Description**
CB04B	2025	Carlsbad	El Camino Real and Cannon Road	Local Improvements – RAS	In Carlsbad, along the east side of El Camino Real just south of Cannon Road, widen to prime arterial standards with three through lanes, a right turn lane, and a sidewalk approaching the intersection
CB22	2025	Carlsbad	Avenida Encinas – Widen from Palomar Airport Road to Embarcadero Lane	Local Improvements – Street and Road	In Carlsbad, Avenida Encinas from Palomar Airport Road southerly to existing improvements adjacent to Embarcadero Lane, roadway widening to secondary arterial standards
CB31	2025	Carlsbad	El Camino Real Widening – La Costa Avenue to Arenal Road	Local Improvements – RAS	In Carlsbad, along El Camino Real from 700 feet north of La Costa Avenue to Arenal Road, widening along the southbound side of the roadway to provide three travel lanes and a bike lane in accordance with prime arterial standards
CB32	2025	Carlsbad	El Camino Real Widening – Poinsettia to Camino Vida Roble	Local Improvements – RAS	In Carlsbad, widen El Camino Real from 900 feet north of Cassia Road to Camino Vida Roble, along the northbound side of the roadway to provide three travel lanes and a bike lane in accordance with prime arterial standards
CB59	2025	Carlsbad	El Camino Real Widening – Sunny Creek to Jackspar	Local Improvements – RAS	In Carlsbad, on El Camino Real from Sunny Creek to Jackspar, widen along the northbound side of El Camino Real to provide three travel lanes (currently two lanes northbound), sidewalk, and a bike lane
CHV69	2025	Chula Vista	Heritage Road Bridge	Ops/Maintenance – Highway Bridge Program	On Heritage Road from the intersection of Main Street and Nirvana Avenue to Entertainment Circle, widen and lengthen bridge over Otay River from four-lane to six-lane bridge that accommodates shoulders, sidewalk, and median
CHV87	2025	Chula Vista	E Street Extension from Bay Boulevard to H Street	Local Improvements – Street and Road	Extension of E Street and F Street west of Bay Boulevard, and the realignment of Gun Powder Point Drive for Chula Vista Bayfront redevelopment; project includes construction of a roundabout at E Street, F Street, and Gunpowder Point Drive, and Class I and II bike paths, and sidewalks
CNTY14A	2025	San Diego County	South Santa Fe Avenue South	Local Improvements – RAS	South Santa Fe Avenue from 700 feet south of Woodland Drive to Smilax Road, widening of South Santa Fe Avenue to a five-lane major road with a center left turn lane, curb, gutter, sidewalk, bike lanes, and drainage improvements

Arterials					
TIP ID	**Year Built**	**Lead**	**Project Name**	**Category**	**Description**
CNTY21	2025	San Diego County	Bradley Avenue Widening and Overpass at SR 67	Local Improvements – RAS	Widen Bradley Avenue from Magnolia Avenue to Mollison Avenue; widen from two lanes to four lanes plus sidewalks; replace two-lane bridge over SR 67 with a six-lane bridge that accommodates turn pockets
CNTY34	2025	San Diego County	Dye Road Extension	Local Improvements – RAS	Dye Road to San Vicente Road – in Ramona, study, design, and construct a two-lane community collector road with intermittent turn lanes, bike lanes, curb, gutter, and pathway/walkway
CNTY98	2025	San Diego County	Otay Lakes Road	Local Improvements – RAS	Four-lane boulevard with raised median from the City/County boundary to Strada Piazza, and two-lane community collector with intermittent turn lanes to the east
ESC04	2025	Escondido	Citracado Parkway II	Local Improvements – RAS	West Valley to Harmony Grove, widen from two to four lanes with raised medians, construct bridge over Escondido Creek
ESC08	2025	Escondido	Felicita Ave/ Juniper Street	Local Improvements – Street and Road	Widen from two to four lanes with left turn pockets, raised medians on Felicita; new traffic signals at Juniper and Chestnut, Juniper, and 13th Avenue, Juniper, and 15th Avenue; modify traffic signal at Juniper and Felicita
ESC24	2025	Escondido	Centre City Parkway	Local Improvements – RAS	Mission Road to SR 78, widen four lanes to six lanes with intersection improvements
NC01	2025	National City	Plaza Boulevard Widening	Local Improvements – RAS	Phase II of Plaza Boulevard from Highland Avenue to N Avenue, widen from two to three lanes, including a new traffic lane in each direction, new sidewalks, sidewalk widening, traffic signal upgrades, and interconnection at Plaza Boulevard
NC01	2025	National City	Plaza Boulevard Widening	Local Improvements – RAS	Phase III of Plaza Boulevard from I-805 to Euclid Avenue, widen from two to three lanes, including a new traffic lane in each direction, new sidewalks, sidewalk widening, traffic signal upgrades, and interconnection at Plaza Boulevard
O22	2025	Oceanside	College Boulevard Improvements from Avenida de la Plata to Waring Road	Local Improvements – RAS	In Oceanside, widen from the existing four lanes to six lanes with bike lanes and raised median

Arterials					
TIP ID	**Year Built**	**Lead**	**Project Name**	**Category**	**Description**
SD102A	2025	San Diego	Otay Truck Route Widening (Phase 4)	Local Improvements – Street and Road	Phase II (from Britannia to La Media Road) of Otay Truck Route in San Diego from Drucker Lane to La Media, add one lane (total three lanes) for trucks; from Britannia to La Media, add one lane for trucks and one lane for emergency vehicles (border patrol/fire department access); add one lane for trucks along Britannia from Britannia Court to the Otay Truck Route
SD250	2025	San Diego	La Media Road Improvements	Local Improvements – RAS	In San Diego, on La Media Road from SR 905 to Siempre Viva Road, widen La Media Road to a six-lane primary arterial from SR 905 to Airway Road, and a to a five-lane major road between Airway Road and Siempre Viva Road with three southbound lanes and two northbound lanes. This project will also improve drainage at the intersection of La Media Road and Airway Road (S-15018)
SD34	2025	San Diego	El Camino Real	Ops/Maintenance – Highway Bridge Program	In San Diego on El Camino Real from San Dieguito Road to Via de la Valle, reconstruct and widen from two to four lanes and extend transition lane and additional grading to avoid biological impacts (CIP 52-479.0)
SD70	2025	San Diego	West Mission Bay Drive Bridge	Ops/Maintenance – Highway Bridge Program	In San Diego, replace bridge and increase from four- to six-lane bridge including Class II bike lane (52-643/S00871)
SM19	2025	San Marcos	Grand Avenue Bridge and Street Improvements	Local Improvements – Street and Road	From Discovery Street to San Marcos Boulevard, construct four-lane arterial bridge and a six-lane arterial street from Craven to Grand Avenue
SM24	2025	San Marcos	Woodland Parkway Interchange and Barham Drive Widening and Street Improvements #88005	Local Improvements – RAS	From La Moree Road to Rancheros Drive, modify existing ramps at Woodland Parkway and Barham Drive; widen and realign SR 78 undercrossing and associated work
SM31	2025	San Marcos	San Marcos Creek Specific Plan – Discovery Street Widening and Flood Control Improvements #88265	Local Improvements – RAS	From Via Vera Cruz to Bent Avenue/Craven Road, widen roadway to four-lane secondary arterial
SM32	2025	San Marcos	Via Vera Cruz Bridge and Street Improvements #88264	Local Improvements – Street and Road	From San Marcos Boulevard to Discovery Street, widen to four-lane secondary arterial and construct a bridge at San Marcos Creek

Arterials					
TIP ID	**Year Built**	**Lead**	**Project Name**	**Category**	**Description**
SM42	2025	San Marcos	Discovery Street from Craven to Twin Oaks #ST007	Local Improvements – RAS	In the City of San Marcos, on Discovery Street from Craven Road to west of Twin Oaks Valley Road, construct approximately 5,100 lineal feet of a new six-lane roadway
SM48	2025	San Marcos	San Marcos Creek Specific Plan: Creekside Drive and Pad Grading #88505	Local Improvements – Street and Road	Construct approximately 3,000 feet of a two-lane collector road from Via Vera Cruz to Grand Avenue in the City of San Marcos. The road will include two 12-foot lanes, diagonal parking on the north side, and parallel parking on the south side. In addition, the project will include a ten-foot-wide bike trail meandering along the south side
SM69	2025	San Marcos	Twin Oaks Valley Road and Barham Drive Improvements #ST008	Local Improvements – Street and Road	This project involves surface improvements including asphalt, concrete, medians, sidewalks, signage, and traffic lights. Underground improvements include utility and drainage improvements, relocations, and water treatment within the public right-of-way to accommodate the construction of additional lanes
CB12	2035	Carlsbad	College Boulevard Reach A	Local Improvements – RAS	In Carlsbad, from Badger Lane to Cannon Road, construct a new segment of College Boulevard to provide four-lane roadway with raised median, bike lanes, and sidewalks/trails in accordance with major arterial standards
CNTY35	2035	San Diego County	Ramona Street Extension	Local Improvements – Street and Road	From Boundary Avenue to Warnock Drive – in the community of Ramona, construct new road extension, two lanes with intermittent turn lanes, bike lanes, and walkway/pathway
SD190	2035	San Diego	Palm Avenue/ I-805 Interchange	Local Improvements – RAS	Improvements to the Palm Avenue Bridge over I-805, including repairs to the bridge approaches; a new Project Study Report and Preliminary Environmental Assessment Report; phase II of the project will include widening of the bridge, realignment of existing ramps, possible addition of northbound looping entrance ramp, restriping of traffic lanes, and signal modifications
SD190	2035	San Diego	Palm Avenue/ I-805 Interchange	Local Improvements – RAS	Improvements to the Palm Avenue Bridge over I-805, including repairs to the bridge approaches; a new Project Study Report and Preliminary Environmental Assessment Report; phase III will provide the ultimate build-out of the project which will incorporate improvements of Phase II plus the northbound and southbound entrance ramps (CIP 52-640.0)
SM10	2035	San Marcos	SR 78/Smilax Interchange Improvements	Local Improvements – Street and Road	Construct new interchange at Smilax Road interchange and SR 78 improvements

Mobility Hubs and Flexible Fleets

Mobility hubs are centers of connectivity that allow for a high concentration of travel choices. Flexible Fleets are shared, on-demand transportation services that provide convenient and personalized travel options, generally for short trips to neighborhood destinations such as schools, shopping, dining, parks, grocery stores, as well as connections to high-speed transit options.

A mobility hub's area of influence includes Complete Street treatments for improved on- and off-street accessibility typically spanning one, two, or a few miles around the hub. Facilities will be uniquely designed and based on community characteristics to fulfill a variety of travel needs while strengthening a sense of place. Investments in mobility hubs include land acquisition, amenities (e.g., secure micromobility parking and e-charging, interactive travel kiosks, electric vehicle (EV) charging infrastructure, passenger loading zones, parcel delivery lockers, and carshare parking), pedestrian improvements, and traffic calming treatments.

Figure A.14 shows the Regional Mobility Hub Network designed to connect to, from, and within our core urban communities. Table A.14 details the projects for all mobility hubs in the region, except for the San Ysidro Mobility Hub and Central Mobility Hub which are included in Table A.1 and Table A.2, respectively.

Flexible Fleets build on the popularity of services such as rideshare, bikeshare, and scootershare, and fleets can also include neighborhood shuttles and local delivery services. Many of these services are accessible through mobile apps, and they can be operated by public and private agencies or through partnerships between the two. These fleets provide people with services for all types of trips, 24/7, which can reduce the need to own a car. They also provide important connections between high-speed Transit Leap services and key destinations such as work or home, making it easier for commuters to choose transit.

The elements of the Flexible Fleet investments are included in Table A.14 for the entire region.

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Table A.14: Mobility Hubs and Flexible Fleets

Mobility Hubs and Flexible Fleets					
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Cost ($2020) Millions**
MH1	2025	Mobility Hubs	Mobility Hub Amenities	Mobility hub amenities including secure micromobility parking and e-charging, interactive travel kiosks, EV charging infrastructure, passenger loading zones, parcel delivery lockers, and carshare parking	$152
MH2	2035	Mobility Hubs	Mobility Hub Amenities	Mobility hub amenities including secure micromobility parking and e-charging, interactive travel kiosks, EV charging infrastructure, passenger loading zones, parcel delivery lockers, and carshare parking	$247
MH3	2050	Mobility Hubs	Mobility Hub Amenities	Mobility hub amenities including secure micromobility parking and e-charging, interactive travel kiosks, EV charging infrastructure, passenger loading zones, parcel delivery lockers, and carshare parking	$285
MHLA2	2035	Mobility Hubs	Other Mobility Hub Land Acquisition	Land acquisition for additional future mobility hub anchor stations	$66
CCSI1	2035	Mobility Hubs	Complete Streets Improvements	Complete streets improvements within mobility hubs such as pedestrian, micromobility, and other traffic calming treatments that complement the Adopted Regional Bike Network	$1,857
CCSI2	2050	Mobility Hubs	Complete Streets Improvements	Complete streets improvements within mobility hubs such as pedestrian, micromobility, and other traffic calming treatments that complement the Adopted Regional Bike Network	$619
FF1	2025	Flexible Fleets	Flexible Fleets Operations	Operations for Flexible Fleet services including micromobility, ridehail/carshare, rideshare microtransit, and last-mile delivery	$161
FF2	2035	Flexible Fleets	Flexible Fleets Operations	Operations for Flexible Fleet services including micromobility, ridehail/carshare, rideshare microtransit, and last-mile delivery	$538
FF3	2050	Flexible Fleets	Flexible Fleets Operations	Operations for Flexible Fleet services including micromobility, ridehail/carshare, rideshare microtransit, and last-mile delivery	$1,094

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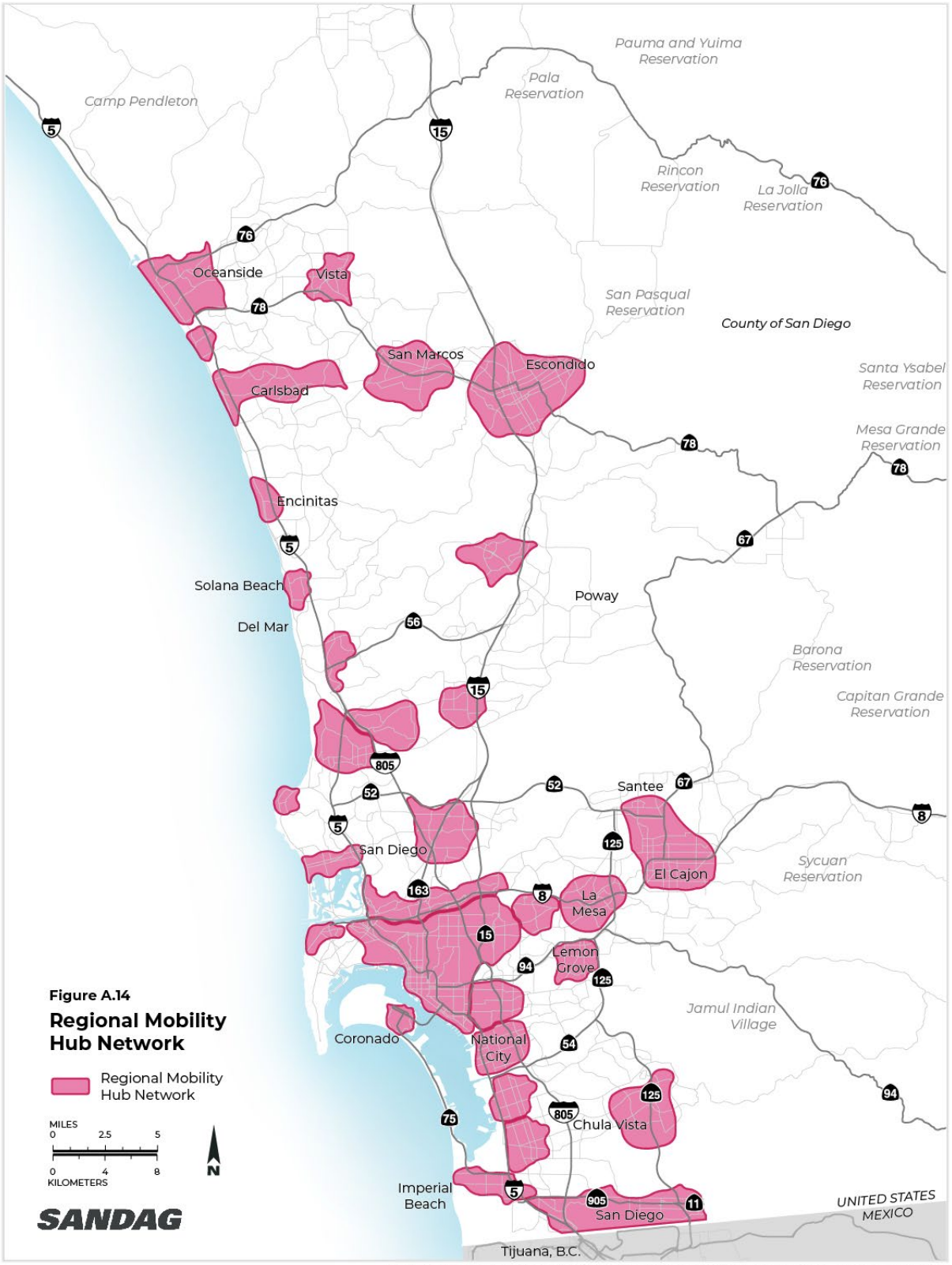
Figure A.14: Regional Mobility Hub Network



These maps show generalized regional Mobility Hub boundaries for planning purposes and are not intended to be binding or precise. Mobility Hub boundaries are subject to refinement in close coordination with the affected jurisdiction(s).

Next Operating System

The Next Operating System (Next OS) is the “brain” of the entire transportation system. It is a digital platform that compiles information from sources such as passenger vehicles, buses, ridesharing vehicles, delivery trucks, bikes, and scooters into a centralized data hub. Analysis of this data will improve how transportation is planned, operated, and experienced. Transportation operators will be able to better manage supply and demand by modifying how infrastructure and services are used throughout the day. The result will be a modernized transportation system with roads and transit services that operate smoothly and serve people better. The elements of Next OS are included in Table A.15.

Table A.15: Next Operating System

Next Operating System					
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Cost ($2020) Millions**
NO01	2025	Next OS	Data Hub	High-speed data analytics, data repository, and data performance management platform that will bring together public transportation data and develop a public–private information exchange with companies such as transportation network companies	$32
NO02	2035	Next OS	Curb Access and Parking	Dynamic management of curbs including access and pricing rules	$12
NO03	2035	Next OS	Transit Optimization	Dynamic transit routing, scheduling, and communications	$7
NO04	2035	Next OS	Mobility as a Service	Application to plan, book, and pay across public and private shared services	$10
NO05	2025	Next OS	Smart Intersections	Intersection safety and signal timing systems that give priority to transit, freight, and emergency vehicles and reduce intersection vehicle and pedestrian conflicts	$19
NO06	2035	Next OS	Next Generation Integrated Corridor Management System	Provide coordinated response and control for real-time operations across freeway, arterials, and transit networks	$7
NO07	2025	Next OS/ Goods Movement	Regional Border Management System	Regional Border Management System with wait times and dynamic tolling to reduce crossborder wait times	$15
NO08	2035	Next OS	Systems and Software	Enables regional transportation system operators to collect, analyze, and share data to improve transportation systems management and operations	$65
NO09	2035	Next OS	Operations	Next OS ongoing operations and future system upgrades	$65

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Systemwide Transit Support Services

In addition to the transit capital projects shown in the major corridor tables, there are also several other supporting transit services and programs that make up the breadth of the transit investments included in the 2021 Regional Plan. Collectively, these services and programs support the Transit Leap component of the 2021 Regional Plan as the region prepares to leap into a future of greater connectivity and high-speed services.

These systemwide transit support services are:

- **Transit Operations Costs:** Based on vehicle, revenue hours, and service spans by service type
- **Transit Frequency Enhancements:** Those routes where frequencies are increased to support more robust local bus service on select corridors
- **Commuter Rail Maintenance Facilities:** Maintenance facilities to enable the operations of the additional commuter rail routes being planned in the system
- **Transit Fare Subsidies:** Subsidies to reduce the fares paid by transit riders

These systemwide transit investments are shown in Table A.16. The specific transit frequency and service span enhancements (by route) are shown in Attachment 1: Transit Leap Frequency and Span of Service.

Table A.16: Systemwide Transit Support Services

Systemwide Transit Support Services				
Project ID	**Year Built**	**Category**	**Project Name**	**Cost ($2020) Millions**
—	2025	Transit Leap	Systemwide Operations Costs	$2,551
TL60	2025	Transit Leap	Vehicle Purchases and Replacements (including spares)	$466
TL63	2025	Transit Leap	Local Bus Route Enhanced Frequencies – ten minutes in key corridors	Included with operations costs
—	2035	Transit Leap	Systemwide Operations Costs	$6,636
TL08	2035	Transit Leap	Commuter Rail Maintenance Facilities	$344
TL61	2035	Transit Leap	Vehicle Purchases and Replacements (including spares)	$1,274
TL64	2035	Transit Leap	Local Bus Route Enhanced Frequencies – ten minutes in key corridors	Included with operations costs
TL66	2035	Transit Leap	Transit Fare Subsidies	$752
—	2050	Transit Leap	Systemwide Operations Costs	$13,776
TL09	2050	Transit Leap	Commuter Rail Maintenance Facilities	$344
TL62	2050	Transit Leap	Vehicle Purchases and Replacements (including spares)	$2,541
TL65	2050	Transit Leap	Local Bus Route Enhanced Frequencies – ten minutes in key corridors	Included with operations costs
TL67	2050	Transit Leap	Transit Fare Subsidies	$3,923

Supporting Policies and Programs

Program investments include those pertaining to land use and habitat, housing, climate action planning (CAP), climate adaptation and resilience, EVs, parking and curb management, transportation demand management (TDM), and Vision Zero. These investments will support programs that complement the capital and operational investments of the transportation system, encourage sustainable growth and development, and implement innovative demand strategies. Local programs include grants and resources to support capital and planning activities for local jurisdictions. Regional programs support the conservation and management of habitat, adoption of new technologies, and encouragement of residents, businesses, and community organizations to use transportation alternatives to driving alone. Table A.17 displays the programs and costs associated with Supporting Policies and Programs.

Table A.17: Supporting Policies and Programs ($2020) Millions

Supporting Policies and Programs ($2020) Millions				
	2025	**2035**	**2050**	**Total**
Land Use and Habitat				
Planning and capital mobility hub/smart growth/vehicle miles traveled reduction grants	$50	$150	$200	$400
Member agency resources to enhance development review/ processes/update policies	$10	$50	$75	$135
Habitat conservation, management, and monitoring	$169	$555	$1,363	$2,087
Housing				
Affordable Housing Grant Program	$730	$1,400	$500	$2,630
Climate Action Planning				
CAP Monitoring Program	$4	$20	$12	$37
CAP implementation grants	$20	$100	$150	$270
Regional carbon reduction program management	$6	$50	$75	$131
Climate Adaptation and Resilience				
Climate Adaptation and Resilience Program	$8	$50	$50	$108
Nature-based climate solutions	$40	$325	$200	$565
Resilient capital grants and innovative solutions	$20	$75	$100	$195
Electric Vehicles				
Incentives for zero-emission vehicles (ZEVs)	$52	$552	—	$604
EV charging stations	$45	$133	$91	$270
Hydrogen fueling stations	—	$100	$150	$250
Zero-emission buses and infrastructure	$75	$250	$332	$657
Goods movement vehicles and infrastructure	$25	$100	$104	$229

Supporting Policies and Programs ($2020) Millions				
	2025	2035	2050	Total
Parking and Curb Management				
Member agency resource/coordination	$8	$100	$40	$148
Transportation Demand Management				
GO by BIKE	$0.2	$0.5	$1	$1
TDM innovation and shared streets grants	$1	$50	$4	$55
E-bike incentive	$5	$15	$15	$35
Program administration	$19	$59	$89	$167
Commuter Services and Bike Program	$18	$35	$56	$109
Rideshare Incentive Program	$1	$1	$2	$4
Marketing, outreach, and education	$11	$23	$35	$69
TDM ordinance	$8	$40	$60	$108
Vision Zero				
Member agency project resource/coordination	$6	$25	$15	$46
Community based education	$4	$25	$25	$54
Capital and planning grants	$25	$150	$150	$325

Other Systemwide Programs

Table A.18 includes other systemwide programs and costs: Local Streets and Roads Program, Local Bike Program, Highway Maintenance and Operations, and Debt Service.

Table A.18: Other Systemwide Programs ($2020) Millions

Other Systemwide Programs ($2020) Millions			
Category	2025	2035	2050
Local Streets and Roads Program	$2,041	$4,821	$7,531
Local Bike Program	$238	$477	$715
Highway Maintenance and Operations	$1,747	$4,110	$6,473
Debt Service	$1,538	$3,087	$3,679

Unconstrained Goods Movement Projects

While there are nearly $500 million in specific goods movement projects identified in the 2021 Regional Plan (and other highway projects and rail projects that support goods movement) as shown in the major corridor tables, there are also several projects for which funding has not yet been identified or which would be funded and implemented by other agencies and the private sector. These projects are described in Table A.19 and shown in Figure A.15.

Table A.19: Unconstrained Goods Movement Projects

Unconstrained Goods Movement Projects					
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Cost ($2020) Millions**
GM10	UNC	Goods Movement: Air	San Diego International Airport (SDIA) Interior Northside Roadway	SDIA interior northside roadway	$18
GM11	UNC	Goods Movement: Air	SDIA Cargo Facility Improvements	SDIA air cargo facility improvements for cargo storage and handling	N/A
GM12	UNC	Goods Movement: Air	Brown Field Improvements	Brown Field access improvements/Metropolitan Airpark	N/A
GM13	UNC	Goods Movement: Maritime	National City Marine Terminal (NCMT) Rail Improvements	NCMT freight rail improvements, including but not limited to additional rail storage facilities in the vicinity of the balloon track	$4
GM14	UNC	Goods Movement: Maritime	NCMT Optimization Plan	NCMT rail, electrical, and other infrastructure and equipment improvements	$15
GM15	UNC	Goods Movement: Maritime	Tenth Avenue Marine Terminal (TAMT) Optimization Plan	TAMT Optimization Plan: enhanced electrical infrastructure/equipment and enhanced and additional on-dock rail	$39
GM16	UNC	Goods Movement: Maritime	TAMT Rail Improvements	TAMT freight rail improvements, including but not limited to track upgrades and increased staging area for rail cargo and loading	$39
GM17	UNC	Goods Movement: Maritime	TAMT Cargo Staging	TAMT marine cargo staging and handling projects, including but not limited to enhanced open storage, shed demolition, cargo handling infrastructure improvements, deployment of zero- and near-zero-emission infrastructure and equipment, wharf reinforcements, additional crane(s), on-dock shorepower, improvements to facilitate “marine highway” cargo, and front gate technology enhancements	$123
GM18	UNC	Goods Movement: Maritime	NCMT Cargo Staging	NCMT marine cargo staging and handling projects, including but not limited to construct vertical storage solutions or intermodal transfer facilities for additional roll-on/roll-off cargo storage and handling, deployment of zero- and near-zero-emission infrastructure and equipment, on-dock shorepower, wharf extension to create two new berths, and improvements to facilitate “marine highway” cargo	$132

Unconstrained Goods Movement Projects					
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Cost ($2020) Millions**
GM19	UNC	Goods Movement: Maritime	NCMT Truck Parking/ Staging	Truck parking and staging alternatives for NCMT	N/A
GM20	UNC	Goods Movement: Mexico	Tijuana-Tecate Rail Line Improvements	Tijuana-Tecate rail line improvements	$28
GM21	UNC	Goods Movement: Mexico	Mesa de Otay II POE	Mesa de Otay II POE and related roads	N/A
GM22	UNC	Goods Movement: Mexico	Tijuana Intermodal Terminal	Tijuana Intermodal Terminal/Distribution Center	N/A
GM23	UNC	Goods Movement: Mexico	Ensenada Port Expansion	Ensenada Port Expansion	N/A
GM24	UNC	Goods Movement: Mexico	Mexican Rail Yard Multimodal Center	Mexican Rail Yard Bicentennial Multimodal Center in Tijuana	N/A
GM25	UNC	Goods Movement: Mexico	Jacumé POE	Jacumé POE	N/A
GM26	UNC	Goods Movement: Mexico	Tecate POE Expansion	Expansion of Tecate POE cargo inspection facility	N/A
GM27	UNC	Goods Movement: Pipeline	Mission Valley Terminal Access	I-15 access to Kinder Morgan (KM) Mission Valley Terminal	N/A
GM28	UNC	Goods Movement: Pipeline	Miramar Terminal	KM, new Miramar junction/terminal/tanks	N/A
GM29	UNC	Goods Movement: Pipeline	Mexico Pipeline Expansion	KM expand to 16 pipes/extend to Mexico	N/A
GM30	UNC	Goods Movement: Policies	Stakeholder Collaboration for Air Quality Improvements	Collaborate with stakeholders, including community members, public agencies, and commercial industry representatives on the implementation of air quality improvement programs	N/A
GM31	UNC	Goods Movement: Policies	Freight Origin-Destination Data Collection	Collect or procure freight origin-destination data to determine intraregional and interregional flows and better inform planning decisions	N/A
GM32	UNC	Goods Movement: Policies	Urban Deliveries	Develop a curbside and sidewalk management strategy for urban deliveries	N/A
GM33	UNC	Goods Movement: Policies	Community-Sensitive Freight Hub Improvements	Encourage context-sensitive community improvements that support access to freight hubs	N/A
GM34	UNC	Goods Movement: Policies	Freight Gateway Study Update	Update the SANDAG Freight Gateway Study with the latest freight data, trends, and innovations	N/A
GM35	UNC	Goods Movement: Policies	Truck Parking Strategy Development and Implementation	Develop and implement truck parking strategies	N/A

Unconstrained Goods Movement Projects

Project ID	Year Built	Category	Project Name	Description	Cost ($2020) Millions
GM36	UNC	Goods Movement: Policies	Rail and Vehicle Traffic Operational Improvements	Encourage operational improvements to better manage vehicle and rail traffic in the region	N/A
GM37	UNC	Goods Movement: Policies	Expand ZEV Infrastructure	Expand near-zero- and zero-emission infrastructure	N/A
GM38	UNC	Goods Movement: Policies	U.S. and Mexico Collaboration on Freight Projects and Policies	Collaborate with U.S. and Mexico agencies, community members, commercial industry representatives, and additional stakeholders on freight projects and policies	N/A
GM39	UNC	Goods Movement: Policies	Trucks on MLs	Potential use of MLs during off-peak periods for moving goods	N/A
GM40	UNC	Goods Movement: Policies	Unmanned Aircraft System (UAS) Delivery Strategy	Develop a strategy for UAS deliveries	N/A
GM41	UNC	Goods Movement: Rail	Desert Line Rehab	Desert Line basic service, rehabilitation	$253
GM42	UNC	Goods Movement: Rail	Rail Logistics Centers	New rail logistics centers at key locations	N/A
GM43	UNC	Goods Movement: Roadways	Truck Staging Modernization	Modernizing existing truck parking/staging areas for near-zero- to zero-emission infrastructure truck shorepower—based on outcomes of Caltrans HQ truck parking study	$2
GM44	UNC	Goods Movement: Roadways	Freight Signal Prioritization Pilot	Continuation of San Diego Port Tenants Association's Freight Signal Prioritization project (California Energy Commission pilot)	N/A
GM45	UNC	Goods Movement: Roadways	Truck Parking Information Management System	Truck Parking Information Management System: resource for tenants and truck operators to obtain information and potentially reserve parking resources; could be tied to Port Freight Community Web Portal	$10
GM46	UNC	Goods Movement: Roadways	New Truck Parking Opportunities	New dynamic truck parking/staging areas—based on outcomes of Caltrans HQ truck parking study	$41
GM47	UNC	Goods Movement: Roadways	Vesta Bridge: Phases 2 and 3	Vesta Bridge: Phases 2 and 3	$100
GM48	UNC	Goods Movement: Roadways	I-8 Alternative Fuel Corridor	I-8 Alternative Fuel Corridor from San Diego to Imperial County border	N/A
GM49	UNC	Goods Movement: Roadways	I-15 Alternative Fuel Corridor	I-15 Alternative Fuel Corridor	N/A
GM50	UNC	Goods Movement: Roadways	SR 78 Alternative Fuel Corridor	SR 78 Alternative Fuel Corridor from I-5 interchange to I-15 interchange	N/A
GM51	UNC	Goods Movement: Roadways	I-5 Alternative Fuel Corridor	I-5 Alternative Fuel Corridor from Orange County border to Mexico border	N/A

Unconstrained Goods Movement Projects					
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Cost ($2020) Millions**
GM52	UNC	Goods Movement: Roadways	Freight Hub Access Improvements	Improving access roads (first- and last-mile connections) and highway access to major freight hubs: airport, seaport, pipeline, border crossings, etc.	N/A
GM53	UNC	Goods Movement: Roadways	Truck Route MLs	New MLs along primary truck routes in the region	N/A
GM54	UNC	Goods Movement: Roadways	Freight Capacity Improvements	Increased truck capacity on key freight corridors: I-5, I-8, I-15, SR 52, SR 78, SR 94, SR 125, among others	N/A
GM55	UNC	Goods Movement: Roadways	SR 52 Truck Climbing Lane	SR 52 truck climbing lane	N/A
NO07-GM56	UNC	Next OS/ Goods Movement	Truck Route Data	Back-end access: Caltrans (e.g., Surface Transportation Assistance Act database and local/regional truck routes and private sector commercial vehicle specific routing services [i.e., HERE, Inrix, Wejo, etc.])	N/A
NO07-GM57	UNC	Next OS/ Goods Movement	Permit Requirements Data	Back-end access: Caltrans, California Highway Patrol (CHP), Department of Motor Vehicles, Franchise Tax Board databases/referral information	N/A
NO07-GM58	UNC	Next OS/ Goods Movement	Maritime Port Data	Back-end access: Port of San Diego data for NCMT, TAMT access requirements, queues, routing, staging, parking, tenants, hours of operation, etc.	N/A
NO07-GM59	UNC	Next OS/ Goods Movement	Airport Data	Back-end access: San Diego Airport Authority cargo facility and cruise ship cargo terminal access requirements, queues, routing, staging, parking, tenants, hours of operation, etc.	N/A
NO07-GM60	UNC	Next OS/ Goods Movement	Hazardous Material Safe Parking Data	Back-end access: California Code of Regulations data, other public or private sources	N/A
NO07-GM61	UNC	Next OS/ Goods Movement	Emergency Response and Other Data	Back-end access: emergency response and other similar data, particularly for hazmat cargo carriers	N/A
NO07-GM62	UNC	Next OS/ Goods Movement	Truck Information System Front-End Application/ Data Provisions	Truck information system: front-end application or data provision to front-end application provider: design, facilitation, Application Programming Interface development, support, maintenance, operation, agreements, memorandums of understanding, etc.	N/A
NO07-GM63	UNC	Next OS/ Goods Movement	Truck Routing Restrictions, Extralegal, HazMat and Alternative Route Data	Back-end access: e.g., Caltrans Calroute (Route Clearing Database), Single-Trip Application and Routing System (STARS2), and Extralegal Load Network (ELLN)	N/A

Unconstrained Goods Movement Projects					
Project ID	**Year Built**	**Category**	**Project Name**	**Description**	**Cost ($2020) Millions**
NO07-GM64	UNC	Next OS/ Goods Movement	Truck Repair Facilities and Services Data	Back-end access: heavy-duty mobile repair and fixed facility databases, general directories, repair facility/service provider subscriptions	N/A
NO07-GM65	UNC	Next OS/ Goods Movement	Current/Forecasted Weather Data	Back-end access: truck-relevant weather data, such as high-profile vehicle wind warning, ice, snow, etc; sources: National Oceanic and Atmospheric Administration, National Weather Service, Clarus Initiative	N/A
NO07-GM66	UNC	Next OS/ Goods Movement	Truck Stop and Fuel Price Data	Back-end access: relevant databases for truck-accessible fuel and stop locations: National Association of Truck Stop Operators, Oil Price Information Service, facility databases (truckstops.com), general directories	N/A
NO07-GM67	UNC	Next OS/ Goods Movement	Roadside Safety Inspection Station Data	Back-end access: Caltrans/CHP data/database	N/A
NO07-GM68	UNC	Next OS/ Goods Movement	Public Scale/ Weigh Station Data	Back-end access: online public scale directory database(s), public scale service provider subscriptions	N/A
NO07-GM69	UNC	Next OS/ Goods Movement	Parking and Rest Area Data	Back-end access: Caltrans Smart Parking for Trucks database, Federal Highway Administration Truck Parking Initiative data, Federal Motor Carrier Safety Administration SmartPark data, UC Berkeley/Caltrans American Truck Parking database	N/A
NO07-GM70	UNC	Next OS/ Goods Movement	Border Crossing Queue Data	Back-end access and/or data collection: Regional Border Management System, Department of Homeland Security, Caltrans, other public- and private-sector and third-party data providers	N/A

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Figure A.15: Unconstrained Goods Movement Network

Transportation Network Maps

To gain a sense of the full picture of the regional Transportation Network, the following maps show the progression of improvement through the implementation phases. Figures A.16 through A.27 depict the 2016, 2025, 2035, and 2050 Transit Network, Complete Corridors, and Active Transportation Network, respectively. Figure A.28 is the National Highway Freight Network.

Figure A.16: 2016 Transit Network

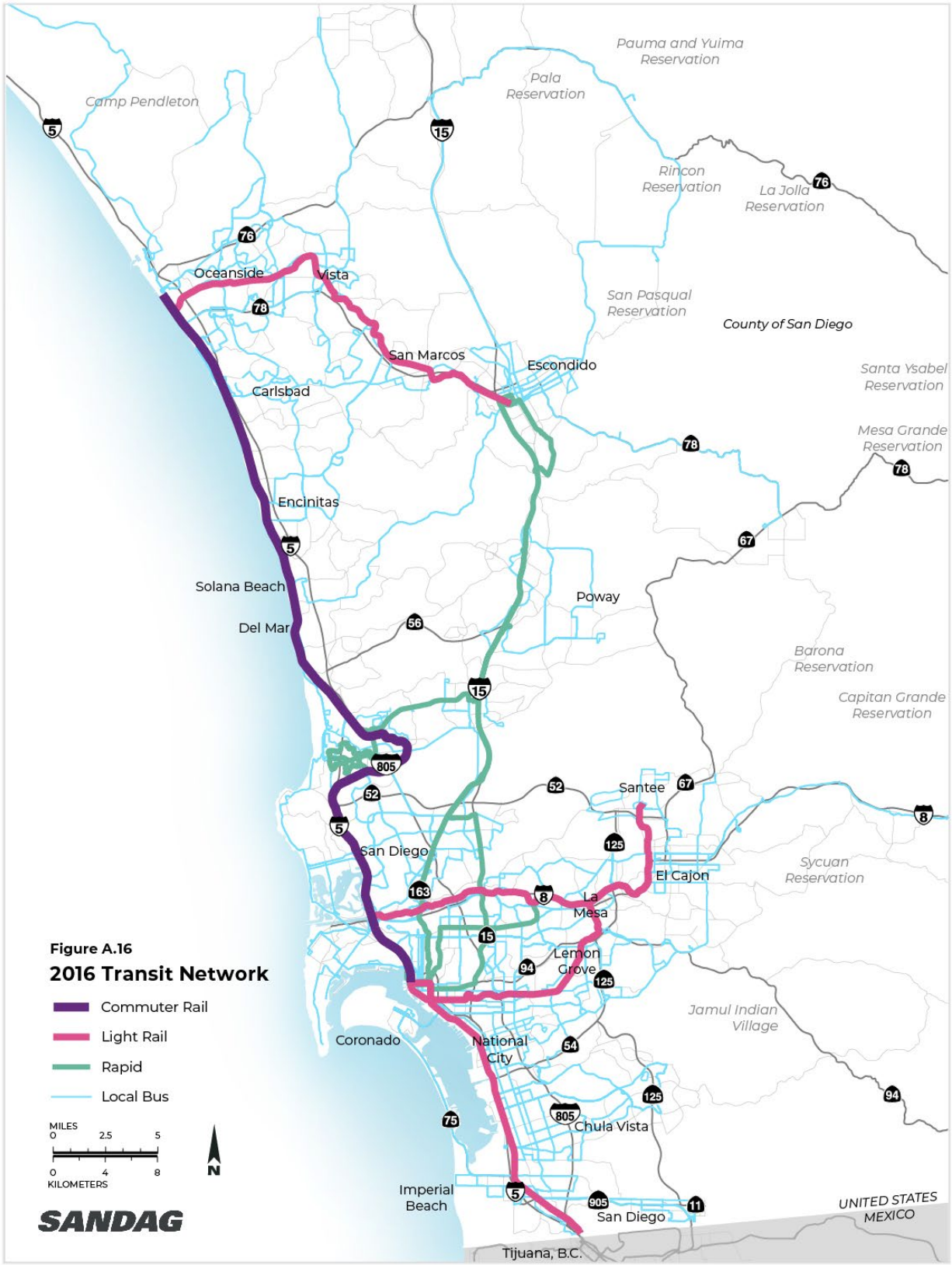


Figure A.17: 2025 Transit Network

Figure A.18: 2035 Transit Network

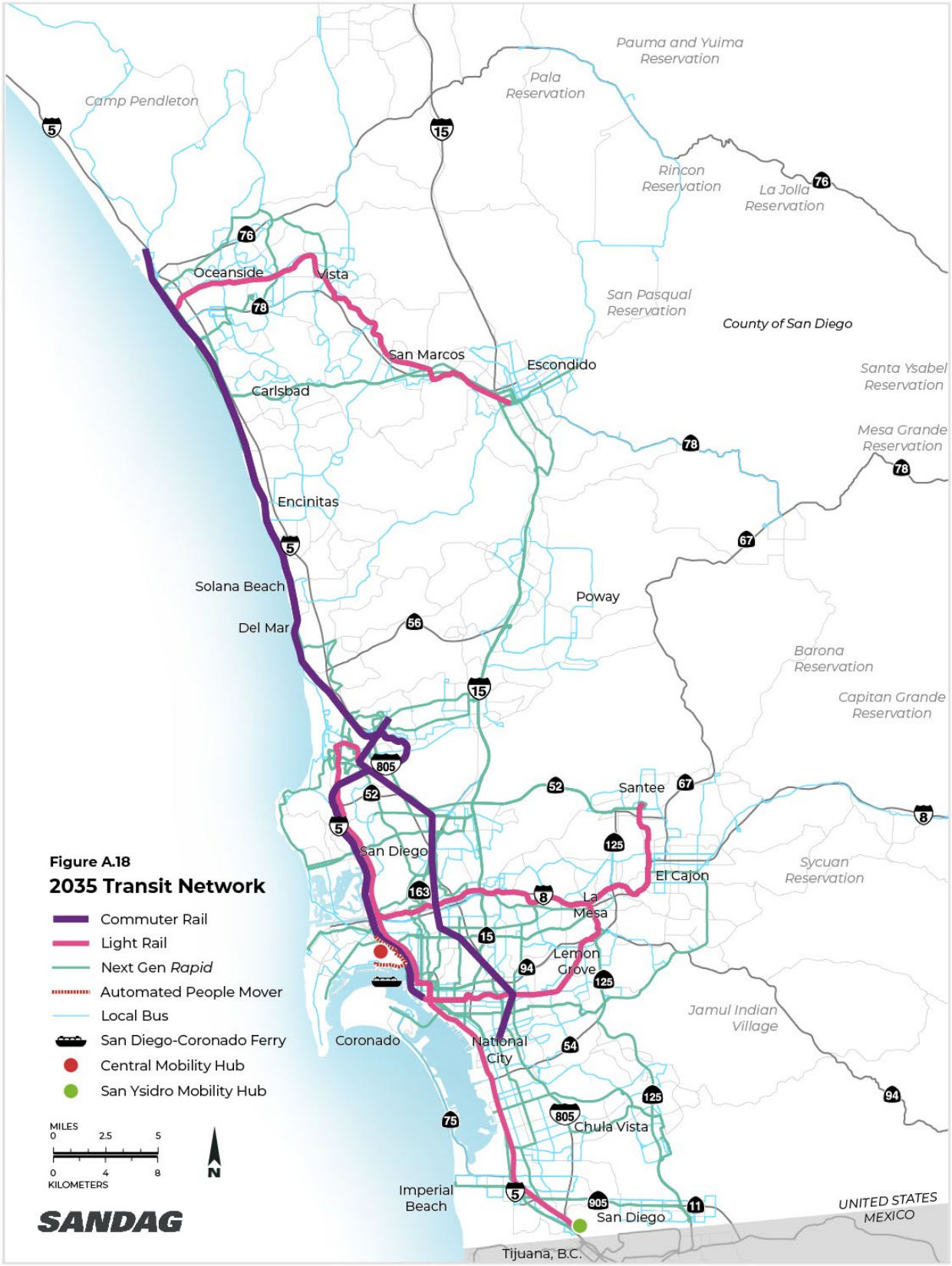


Figure A.19: 2050 Transit Network

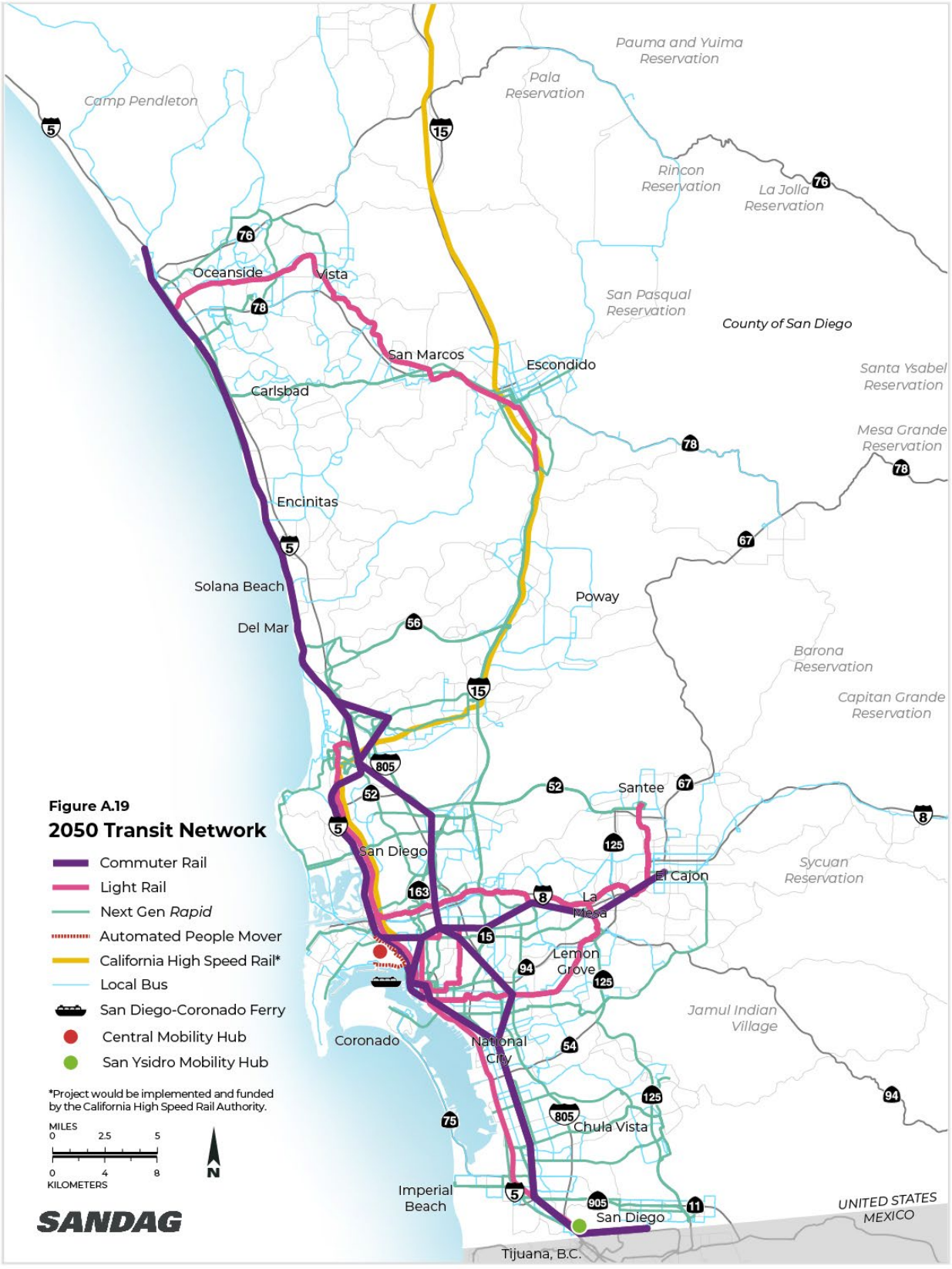


Figure A.20: 2016 Complete Corridors

Figure A.21: 2025 Complete Corridors

Figure A.22: 2035 Complete Corridors

Figure A.23: 2050 Complete Corridors

Figure A.24: 2016 Regional Bike Network

Figure A.25: 2025 Regional Bike Network

Figure A.26: 2035 Regional Bike Network

Figure A.27: 2050 Regional Bike Network

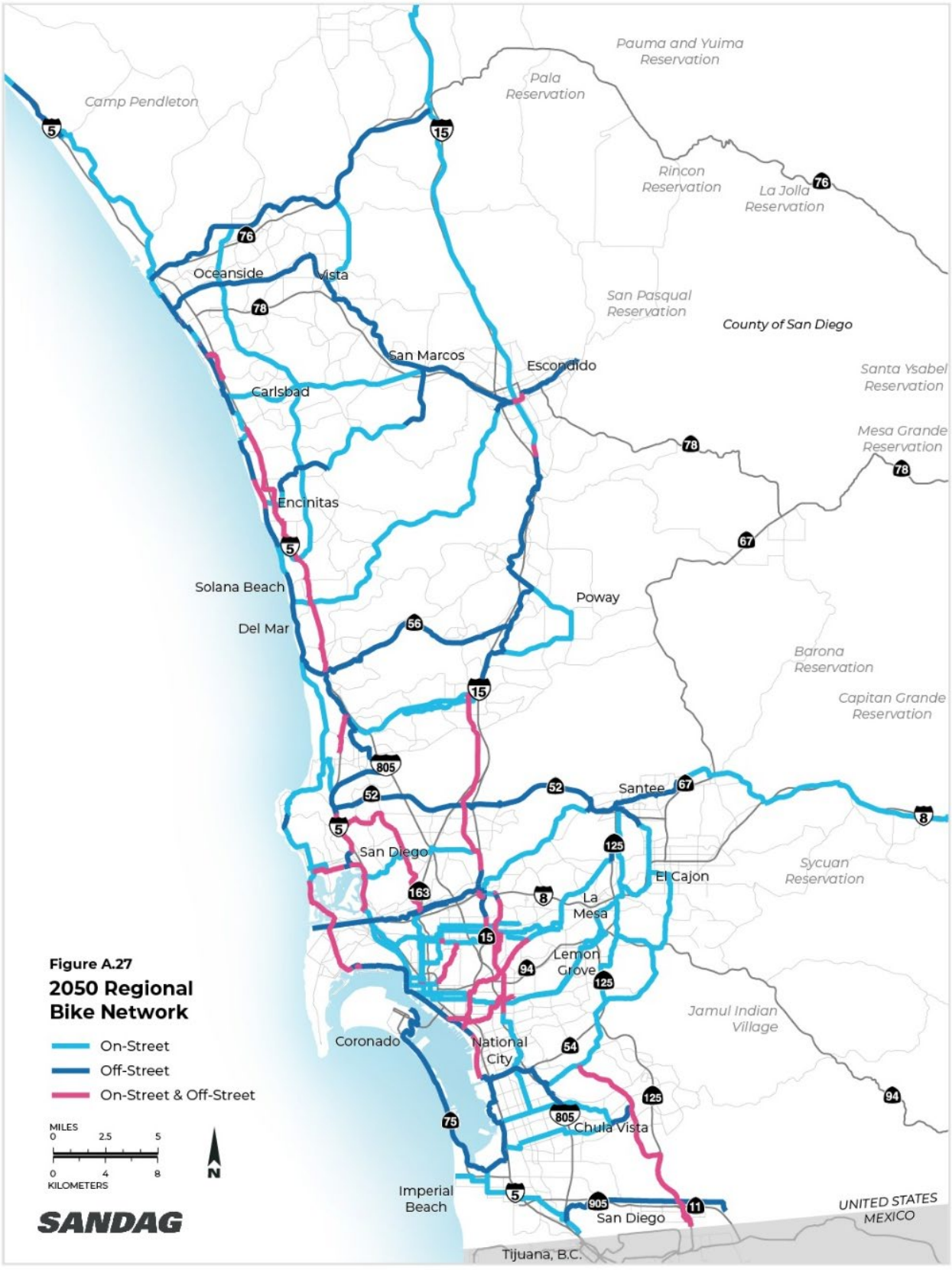
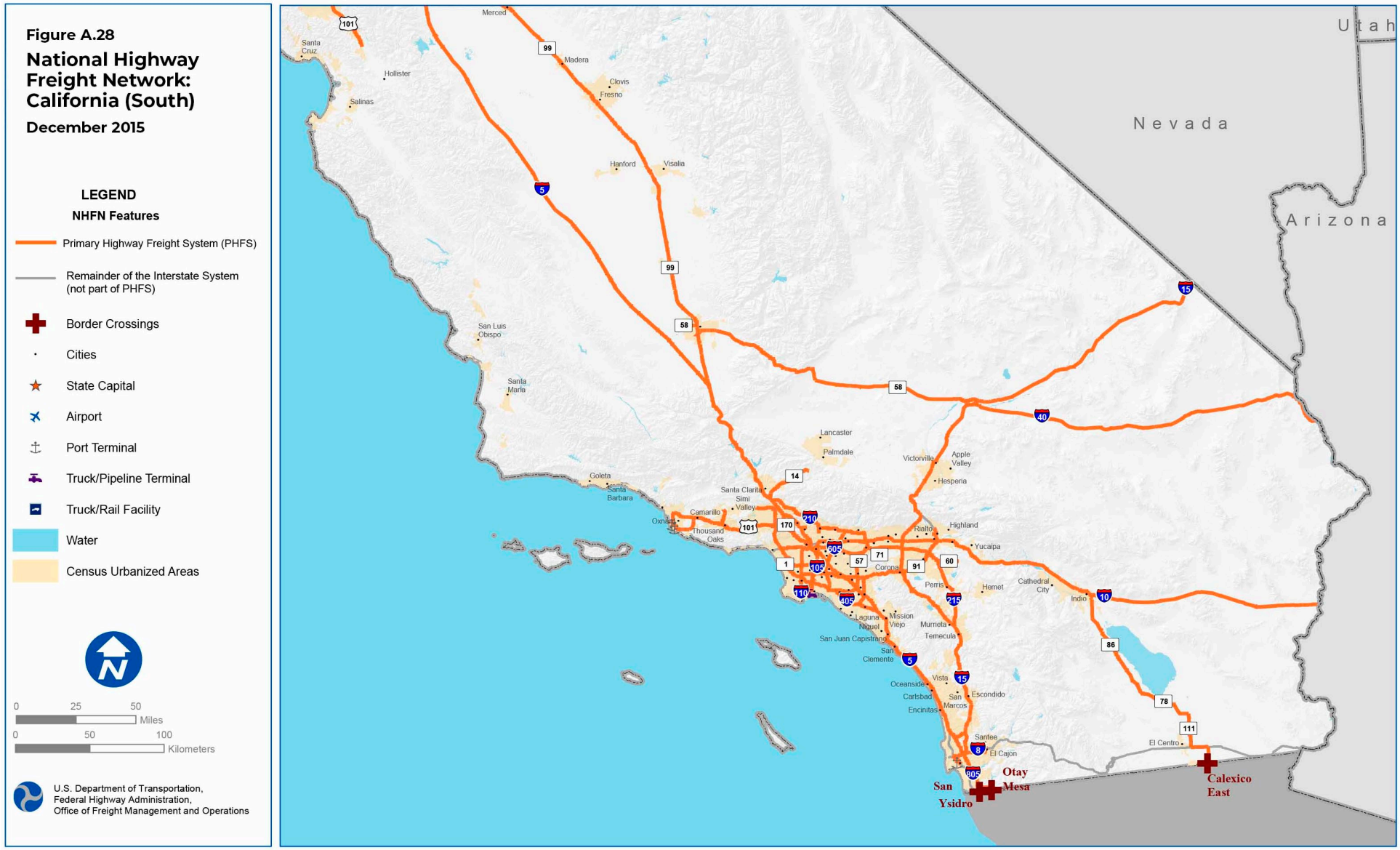


Figure A.28: National Highway Freight Network



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Attachments

Attachment 1: Transit Leap Frequency and Span of Service

Attachment 2: California Assembly Bill 805: Strategies to Reduce Pollution Exposure in Disadvantaged Communities

Appendix A Attachment 1:

Transit Leap Frequency and Span of Service

Transit Leap Frequency and Span of Service

Service	Route	Description	Existing Frequency (in minutes)		2025 Frequency (in minutes)		2035 Frequency (in minutes)		2050 Frequency (in minutes)		Existing Span of Service	2050 Span of Service
			Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak		
Commuter Rail	398	COASTER	36–45	120–180	30	60	20	60	20	60	5 a.m.–8:00 p.m.	4 a.m.–12 a.m.
Commuter Rail	581	581: Downtown to El Cajon via San Diego State University (SDSU) and La Mesa 581B: Central Mobility Hub to El Cajon via SDSU and La Mesa	--	--	--	--	--	--	10	10	--	4 a.m.–2 a.m.
Commuter Rail	582	2035: Sorrento Mesa to National City via University Town Center (UTC), Kearny Mesa, and City Heights 2050: Sorrento Mesa to U.S.–Mexico Border via UTC, Kearny Mesa, City Heights, and West/South Bay	--	--	--	--	10	10	10	10	--	4 a.m.–2 a.m.
Commuter Rail	583	Central Mobility Hub to U.S.–Mexico Border, via Downtown San Diego	--	--	--	--	--	--	10	10	--	4 a.m.–2 a.m.
Light Rail Transit (LRT)	399	SPRINTER (Oceanside to Escondido)	30	30	30	30	15	15	10	10	4 a.m.–9:30 p.m.	4 a.m.–2 a.m.
LRT	510	Blue Line (San Ysidro to UTC)	7.5	7.5	7.5 SY–DT 15 (DT–UTC)	7.5 SY–DT 15 (DT–UTC)	7.5	7.5	7.5	7.5	4:30 a.m.–1:30 a.m.	4 a.m.–2 a.m.
LRT	520	Orange Line (El Cajon to Downtown)	15	15	15	15	7.5	7.5	7.5	7.5	4:30 a.m.–1:30 a.m.	4 a.m.–2 a.m.
LRT	530	Green Line (Santee to Downtown)	15	15	15	15	7.5	7.5	7.5	7.5	4 a.m.–1 a.m.	4 a.m.–2 a.m.
Tram	555	Tram: Downtown to Logan Heights, Golden Hill, South Park, North Park, University Heights, Hillcrest	--	--	--	--	--	--	10	10	--	4 a.m.–2 a.m.
Airport Connection	577	Central Mobility Hub to Airport via Car Rental Lot and Harbor Island East Basin	--	--	--	--	2	2	2	2	--	24 hours
Rapid	10	La Mesa to Ocean Beach via Mid-City, Hillcrest, Central Mobility Hub	--	--	10	10	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	12	Spring Valley to Downtown via Southeast San Diego	--	--	10	10	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	28	Point Loma to Kearny Mesa via Central Mobility Hub, Linda Vista	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	30	Balboa Station to Sorrento Mesa via Pacific Beach, La Jolla, UTC	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	41	Fashion Valley to UTC/UC San Diego via Linda Vista and Clairemont	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	103	Del Mar to Sabre Springs via SR 56	--	--	--	--	--	--	10	10	--	4 a.m.–10 p.m.
Rapid	104	Sorrento Valley to Sabre Springs via SR 56	--	--	--	--	--	--	10	10	--	4 a.m.–10 p.m.
Rapid	120	Kearny Mesa to Downtown (DT) via Mission Valley/Fashion Valley (FV)	15 DT–FV 30 (FV–KM)	15 DT–FV 30 (FV–KM)	15 DT–FV 30 (FV–KM)	15 DT–FV 30 (FV–KM)	10	10	10	10	5 a.m.–11:30 p.m.	4 a.m.–12 a.m.
Rapid	201	SuperLoop *Rapid*	10	10	10	10	10	10	10	10	6 a.m.–12 a.m.	4 a.m.–12 a.m.
Rapid	202	SuperLoop *Rapid*	10	10	10	10	10	10	10	10	5:30 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Rapid	204	SuperLoop *Rapid*	30	30	30	30	10	10	10	10	6 a.m.–10 p.m.	4 a.m.–12 a.m.
Rapid	215	SDSU–Downtown via El Cajon Boulevard	10	15	10	10	10	10	10	10	4:30 a.m.–2 a.m.	4 a.m.–12 a.m.
Rapid	225	South Bay *Rapid*	15	30	15	30	10	10	10	10	4:30 a.m.–12 a.m.	4 a.m.–12 a.m.
Rapid	235	Escondido to Downtown San Diego via I-15	15	15	10	10	10	10	10	10	4:30 a.m.–12 a.m.	4 a.m.–12 a.m.
Rapid	237	UC San Diego to Rancho Bernardo via Sorrento Valley and Mira Mesa	15	--	15	--	10	10	10	10	6 a.m.–8:30 p.m.	4 a.m.–10 p.m.
Rapid	238	UC San Diego to Rancho Bernardo via Sorrento Valley and Carroll Canyon	--	--	--	--	10	10	10	10	--	4 a.m.–10 p.m.

Transit Leap Frequency and Span of Service

Service	Route	Description	Existing Frequency (in minutes)		2025 Frequency (in minutes)		2035 Frequency (in minutes)		2050 Frequency (in minutes)		Existing Span of Service	2050 Span of Service
			Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak		
Rapid	280	Downtown San Diego–Escondido	30 pk dir	--	10	30	10	30	10	30	5 a.m.–9 p.m.	4 a.m.–10 p.m.
Rapid	290	Downtown San Diego–Rancho Bernardo Transit Station	30 pk dir	--	10	30	10	30	10	30	5 a.m.–9 p.m.	4 a.m.–10 p.m.
Rapid	292	Pacific Beach to Otay Mesa via Kearny Mesa, El Cajon, Jamacha, and Otay Lakes	--	--	10	10	10	10	10	10	--	4 a.m.–2 a.m.
Rapid	293	Imperial Beach to Otay Ranch via Palomar Street (Upgrade South Bay Rapid to High Speed *Rapid*)	--	--	--	--	--	--	10	10	--	4 a.m.–10 p.m.
Rapid	295	Spring Valley to Clairemont via La Mesa and Kearny Mesa	--	--	--	--	10	10	10	10	--	4 a.m.–10 p.m.
Rapid	350	Escondido *Rapid*	10 pk dir	15	10	10	10	10	10	10	4:30 a.m.–11 p.m.	4 a.m.–12 a.m.
Rapid	440	Carlsbad to Escondido Transit Center via Palomar Airport Road	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	450	Oceanside to Escondido via Palomar Airport Road and SR 78	--	--	10	10	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	471	Downtown Escondido to East Escondido	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	473	Oceanside to Solana Beach to UTC/UC San Diego via Highway 101 Coastal Communities, Carmel Valley	--	--	--	--	10	10	10	10	--	4 a.m.–2 a.m.
Rapid	474	Oceanside to Vista via Mission Avenue/Santa Fe Road Corridor	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	477	Carlsbad Village to SR 76 via College Boulevard, Plaza Camino Real	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	625	SDSU to Palomar Station via East San Diego, Southeast San Diego, National City	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Rapid	630	Iris Trolley/Palomar to Kearny Mesa via I-5/SR 163 and City College	--	--	--	--	10	10	See Route 583	See Route 583	--	4 a.m.–10 p.m.
Rapid	635	Eastlake to Palomar Trolley via Main Street Corridor	--	--	--	--	--	--	10	10	--	4 a.m.–10 p.m.
Rapid	637	North Park to 32nd Street Trolley Station via Golden Hill	--	--	--	--	10	10	10	10	--	4 a.m.–2 a.m.
Rapid	638	Iris Trolley to Otay Mesa via Otay, Airway Drive, SR 905 Corridor	--	--	--	--	--	--	10	10	--	4 a.m.–10 p.m.
Rapid	640	San Ysidro to Central Mobility Hub via I-5 and City College	--	--	--	--	10	10	See Route 583	See Route 583	--	4 a.m.–10 p.m.
Rapid	709	H Street Trolley Station to Millennia via H Street Corridor, Southwestern College	--	--	--	--	10	10	10	10	6 a.m.–11 p.m.	4 a.m.–12 a.m.
Rapid	870	El Cajon to UTC via Santee, SR 52, I-805	--	--	--	--	10	30	10	30	--	4 a.m.–10 p.m.
Rapid	890	El Cajon to Sorrento Mesa via Santee, SR 52, I-805	--	--	--	--	10	30	10	30	--	4 a.m.–10 p.m.
Rapid	910	Coronado to Downtown via Coronado Bridge	--	--	--	--	10	10	10	10	--	4 a.m.–2 a.m.
Rapid	950	Otay Mesa Port of Entry to Imperial Beach via SR 905	10	30	10	10	10	10	10	10	4:30 a.m.–12:30 a.m.	4 a.m.–2 a.m.
Express Bus	20	Kearny Mesa to Rancho Bernardo	15	30	15	30	15	30	15	30	5 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Express Bus	50	Downtown to UTC	30	120–180	--	--	--	--	--	--	5:30 a.m.–7 p.m.	--
Express Bus	60	Euclid Transit Center – UTC	30	--	30	--	X	X	X	X	5 a.m.–8 p.m.	5 a.m.–7 p.m.

Transit Leap Frequency and Span of Service

Service	Route	Description	Existing Frequency (in minutes)		2025 Frequency (in minutes)		2035 Frequency (in minutes)		2050 Frequency (in minutes)		Existing Span of Service	2050 Span of Service
			Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak		
Express Bus	110	Downtown to Mira Mesa	4 morning trips 4 evening trips	--	4 morning trips 4 evening trips	--	15	--	15	--	6 a.m.–6 p.m.	4 a.m.–12 a.m.
Express Bus	140	Balboa Station to La Jolla via I-5	--	--	15	30	10	15	10	15	--	4 a.m.–12 a.m.
Local Bus	1	Fashion Valley–La Mesa	15	15	10	10	10	10	10	10	5 a.m.–12 a.m.	4 a.m.–2 a.m.
Local Bus	2	Downtown San Diego–30th and Adams	12	15	10	10	10	10	10	10	4:30 a.m.–1 a.m.	4 a.m.–12 a.m.
Local Bus	3	UC San Diego Hospital–Euclid Transit Center	12	12	12	12	10	12	10	12	4:30 a.m.–12:30 a.m.	4 a.m.–12 a.m.
Local Bus	4	12th and Imperial Trolley–Lomita Village	30	30	15	15	10	15	10	15	5 a.m.–12 a.m.	4 a.m.–12 a.m.
Local Bus	5	Downtown San Diego–Euclid Transit Center	13	12	13	12	10	12	10	12	5 a.m.–11:30 p.m.	4 a.m.–12 a.m.
Local Bus	6	North Park–Fashion Valley	15	15	7.5	7.5	7.5	7.5	7.5	7.5	6:30 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	7	Downtown San Diego–University/College	10	10	7.5	10	7.5	10	7.5	10	4:30 a.m.–2 a.m.	4 a.m.–12 a.m.
Local Bus	8	Central Mobility Hub–Mission Beach/ Pacific Beach	20	20	10	15	10	15	10	15	5:30 a.m.–12 a.m.	4 a.m.–12 a.m.
Local Bus	9	Central Mobility Hub–Pacific Beach	20	20	15	15	10	15	10	15	6 a.m.–9:30 p.m.	4 a.m.–12 a.m.
Local Bus	10	Old Town–University/College	12	15	See *Rapid* 10	See *Rapid* 10	See *Rapid* 10	See *Rapid* 10	See *Rapid* 10	See *Rapid* 10	4:30 a.m.–12:30 a.m.	See *Rapid* 10
Local Bus	11	SDSU–Downtown San Diego	15	15	10	10	10	10	10	10	4:30 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	12	City College–Skyline Hills	15	15	10	15	10	15	10	15	4:30 a.m.–12 a.m.	4 a.m.–12 a.m.
Local Bus	13	Kaiser Hospital–24th Street Transit Center	12	12	12	12	10	12	10	12	4:30 a.m.–12 a.m.	4 a.m.–12 a.m.
Local Bus	14	Grantville Trolley–Baltimore and Lake Murray	60	60	15	15	15	15	15	15	6 a.m.–7 p.m.	4 a.m.–12 a.m.
Local Bus	18	Grantville Trolley via Camino del Rio	30	30	15	15	15	15	15	15	7 a.m.–5:30 p.m.	4 a.m.–12 a.m.
Local Bus	25	Fashion Valley to Kearny Mesa	60	60	60	60	60	60	60	60	6:30 a.m.–7 p.m.	4 a.m.–10 p.m.
Local Bus	27	Pacific Beach–Kearny Mesa Transit Center	30	30	10	15	10	15	10	15	5:30 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	28	Central Mobility Hub–Shelter Island	15	30	10	15	10	15	10	15	5:30 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	30 (34)	Downtown–UTC/VA Medical Center	15	15	15	15	10	10	10	10	5 a.m.–12:30 a.m.	4 a.m.–12 a.m.
Local Bus	31	UTC–Mira Mesa	30	180	15	30	15	30	15	30	5:30 a.m.–8 p.m.	4 a.m.–12 a.m.
Local Bus	35	Ocean Beach–Central Mobility Hub	15	15	10	15	10	15	10	15	5 a.m.–11:30 p.m.	4 a.m.–12 a.m.
Local Bus	41	Fashion Valley–UC San Diego	15	15	10	15	10	15	10	15	5:30 a.m.–11:30 p.m.	4 a.m.–12 a.m.
Local Bus	43	Balboa Station to Kearny Mesa Transit Center	--	--	15	15	10	15	10	15	--	4 a.m.–12 a.m.
Local Bus	44	Central Mobility Hub–Clairemont Square	15	15	10	15	10	15	10	15	4:30 a.m.–12 a.m.	4 a.m.–12 a.m.
Local Bus	83	Downtown San Diego–Central Mobility Hub	70	70	30	30	30	30	30	30	6 a.m.–7 p.m.	4 a.m.–10 p.m.
Local Bus	84	Point Loma Shuttle	60	60	15	30	15	30	15	30	6 a.m.–6 p.m.	4 a.m.–12 a.m.
Local Bus	88	Central Mobility Hub–Fashion Valley	30	30	15	15	10	15	10	15	6 a.m.–9:30 p.m.	4 a.m.–12 a.m.
Local Bus	89	Solana Beach–UTC	--	--	--	--	15	15	15	15	--	4 a.m.–12 a.m.
Local Bus	101	Oceanside to VA/UC San Diego/UTC via Highway 101	30	30	15	15	10	15	10	15	5 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	105	Central Mobility Hub–University City	30	30	15	15	10	15	10	15	5 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	115	El Cajon Transit Center–SDSU Transit Center	30	30	15	15	10	15	10	15	6 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	276	UC San Diego Shuttle	15	15	15	15	15	15	15	15	6 a.m.–9 p.m.	4 a.m.–10 p.m.
Local Bus	302	Oceanside to Vista via Vista Way	20	20	15	15	10	15	10	15	4:30 a.m.–11:30 p.m.	4 a.m.–12 a.m.
Local Bus	303	Oceanside to Vista via Town Center North	15	15	15	15	10	15	10	15	4 a.m.–12 a.m.	4 a.m.–12 a.m.

Transit Leap Frequency and Span of Service

Service	Route	Description	Existing Frequency (in minutes)		2025 Frequency (in minutes)		2035 Frequency (in minutes)		2050 Frequency (in minutes)		Existing Span of Service	2050 Span of Service
			Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak		
Local Bus	304	Encinitas–San Marcos via Rancho Santa Fe Road	30–60	60	30–60	60	30–60	60	30–60	60	5 a.m.–9 p.m.	4 a.m.–10 p.m.
Local Bus	305	Escondido to Vista via Mission Road and S. Santa Fe Avenue	30	30	15	15	10	15	10	15	4 a.m.–11:30 p.m.	4 a.m.–12 a.m.
Local Bus	306	Fallbrook to Vista via Mission Road	30	60	15	15	15	15	15	15	5 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	308	Solana Beach–Escondido via Del Dios Highway	60	60	6	60	6	60	6	60	5 a.m.–9:30 p.m.	4 a.m.–12 a.m.
Local Bus	309	Oceanside to Encinitas via El Camino Real	30	30	15	15	10	15	10	15	4 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	311	San Luis Rey Transit Center–Rancho Del Oro SPRINTER Station Via Douglas Drive	60	0-180	60	0-180	60	0-180	60	0-180	5 a.m.–6 p.m.	4 a.m.–10 p.m.
Local Bus	313	Oceanside Transit Center to San Luis Rey Transit Center Via Mesa Drive	60	60	60	60	60	60	60	60	6 a.m.–8 p.m.	4 a.m.–10 p.m.
Local Bus	315	Carlsbad Village Station–I-4 Area	45–60	60	45–60	60	45–60	60	45–60	60	4:30 a.m.–9:30 p.m.	4 a.m.–10 p.m.
Local Bus	318	Oceanside to Vista via Oceanside Boulevard and Bobier Drive	36–60	60	15	15	10	15	10	15	4:30 a.m.–8 p.m.	4 a.m.–12 a.m.
Local Bus	323	College Boulevard SPRINTER Station–Quarry Creek	60	60	60	60	60	60	60	60	5 a.m.–6 p.m.	4 a.m.–10 p.m.
Local Bus	325	College Boulevard SPRINTER Station	60	60	60	60	60	60	60	60	6 a.m.–7:30 p.m.	4 a.m.–10 p.m.
Local Bus	332	Vista–Buena Creek SPRINTER Station via Vista Business Park	22	30	22	30	22	30	22	30	4:30 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	334	Vista Circulator	40	40	40	40	40	40	40	40	4:30 a.m.–8 p.m.	4 a.m.–10 p.m.
Local Bus	347	Cal State San Marcos–Palomar College	30	30	30	30	30	30	30	30	5:30 a.m.–7:30 p.m.	4 a.m.–12 a.m.
Local Bus	351	Escondido Circulator	20	20	15	15	15	15	15	15	5 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	352	Escondido Circulator	20	20	15	15	15	15	15	15	4 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	353	Escondido Transit Center–Nordahl Marketplace via Citracado Parkway	60	60	60	60	60	60	60	60	5:30 a.m.–8:30 p.m.	4 a.m.–10 p.m.
Local Bus	354	Orange Glen High School via Mission, Lincoln, and Citrus	30	30	15	15	15	15	15	15	5 a.m.–8:30 p.m.	4 a.m.–12 a.m.
Local Bus	355	El Norte Parkway and Valley Parkway–Counter Clockwise	60	60	30	30	30	30	30	30	6 a.m.–8:30 p.m.	4 a.m.–10 p.m.
Local Bus	356	Morning View Drive, El Norte Parkway, and Escondido Boulevard	30	30	15	30	15	30	15	30	5 a.m.–9:30 p.m.	4 a.m.–12 a.m.
Local Bus	357	El Norte Parkway and Valley Parkway–Clockwise	60	60	30	30	30	30	30	30	6:30 a.m.–6 p.m.	4 a.m.–10 p.m.
Local Bus	358	N. Broadway, Country Club, and El Norte Parkway–Clockwise	120	120	30	30	30	30	30	30	6 a.m.–8:30 p.m.	4 a.m.–10 p.m.
Local Bus	359	N. Broadway, Country Club, and El Norte Parkway–Counter Clockwise	120	120	30	30	30	30	30	30	5 a.m.–7:30 p.m.	4 a.m.–10 p.m.
Local Bus	371	FLEX Ramona Commuter	90	360	90	360	90	360	90	360	5 a.m.–7:30 p.m.	4 a.m.–10 p.m.
Local Bus	388	Escondido to Pala	90	120	30	30	30	30	30	30	4:30 a.m.–10:30 p.m.	4 a.m.–10 p.m.
Local Bus	392	FLEX Oceanside–I-4 Area via Vandergrift	60	60	60	60	60	60	60	60	5 a.m.–8:30 p.m.	4 a.m.–10 p.m.
Local Bus	395	FLEX Oceanside Transit Center–Camp San Onofre via Naval Hospital	180	180	180	180	180	180	180	180	7 a.m.–7 p.m.	4 a.m.–10 p.m.
Local Bus	444	Carlsbad Poinsettia COASTER Connection via Faraday Avenue and Rutherford Road	90 pk dir	--	90 pk dir	--	30	30	30	30	6:30 a.m.–6 p.m.	4 a.m.–10 p.m.
Local Bus	445	Carlsbad Poinsettia COASTER Connection–Palomar College	90 pk dir	--	90 pk dir	--	30	30	30	30	6:30 a.m.–6 p.m.	4 a.m.–10 p.m.
Local Bus	448	Palomar College–Cal State San Marcos via Las Posas and Via Vera Cruz	--	--	15	15	10	10	10	10	--	4 a.m.–12 a.m.

Transit Leap Frequency and Span of Service

Service	Route	Description	Existing Frequency (in minutes)		2025 Frequency (in minutes)		2035 Frequency (in minutes)		2050 Frequency (in minutes)		Existing Span of Service	2050 Span of Service
			Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak		
Local Bus	449	Palomar College–New Development via Twin Oaks Valley and W. Barham Drive	--	--	15	15	10	10	10	10	--	4 a.m.–12 a.m.
Local Bus	647	Mission Valley Loop via Friars Road, Fenton Parkway, and Camino Del Rio S.	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Local Bus	648	Mission Valley Loop via Grantville, Camino Del Rio S., and Fenton Parkway	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Local Bus	649	Kearny Mesa Loop via Balboa Avenue, Ruffner Street, Copley Park Place, and Overland	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Local Bus	661	Otay Mesa Loop via Otay Mesa Road, Heritage Road, Siempre Viva Road, and Alta Road	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Local Bus	668	Kearny Mesa Loop via Ruffin Road, Aero Drive, Murphy Canyon, and Chesapeake Drive	--	--	10	10	10	10	10	10	--	4 a.m.–12 a.m.
Local Bus	675	Rancho Bernardo Business Park Loop	--	--	10	15	10	15	10	15	--	4 a.m.–12 a.m.
Local Bus	701	H Street Transit Center–Palomar Street Transit Center via Hilltop Drive	15	15	10	10	10	10	10	10	5:30 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	704	E Street Transit Center–Palomar Transit Center	30	30	15	15	10	15	10	15	5:30 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	705	E Street Transit Center–Plaza Bonita	30	30	15	15	10	15	10	15	6 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	707	Otay Ranch Town Center–Southwestern College	30	30	15	15	10	15	10	15	5 a.m.–8 p.m.	4 a.m.–12 a.m.
Local Bus	709	H Street Transit Center–Otay Ranch Town Center	15	15	10	15	10	15	10	15	5 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	712	Palomar Transit Center–Southwestern College	10	15	10	10	10	10	10	10	5 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	715	Otay Ranch Loop via Southwest College, La Media Road, Hunte Parkway, and Eastlake Parkway	--	--	--	--	15	30	15	30	--	4 a.m.–12 a.m.
Local Bus	716	Lower Otay Ranch Loop via Birch Road, Orion Avenue, Rock Mountain, and La Media Road	--	--	--	--	10	10	10	10	--	4 a.m.–12 a.m.
Local Bus	815	El Cajon Transit Center–East Main Street	15	15	10	15	10	15	10	15	4:45 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	816	El Cajon Transit Center–Cuyamaca College	30	30	15	15	15	15	15	15	6 a.m.–7 p.m.	4 a.m.–12 a.m.
Local Bus	832	Santee Town Center–North Santee	45	60	45	60	45	60	45	60	6 a.m.–7:30 p.m.	4 a.m.–12 a.m.
Local Bus	833	El Cajon Transit Center–Santee Town Center	45	45	45	45	45	45	45	45	5:30 a.m.–6:30 p.m.	4 a.m.–12 a.m.
Local Bus	834	Santee Town Center–West Santee	60	60	60	60	60	60	60	60	6:30 a.m.–7 p.m.	4 a.m.–12 a.m.
Local Bus	838	East County Square–Viejas	60	60	30	30	30	30	30	30	5 a.m.–8:30 p.m.	4 a.m.–12 a.m.
Local Bus	842	Poway Business Route	--	--	20	60	20	60	20	60	--	4 a.m.–12 a.m.
Local Bus	848	El Cajon–Lakeside	30	30	15	15	15	15	15	15	4:30 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	851	Spring Valley–La Mesa	60	60	15	15	15	15	15	15	5:30 a.m.–7 p.m.	4 a.m.–12 a.m.
Local Bus	852	University Avenue/54th Street–Grossmont Transit Center via University Avenue	30	30	30	30	30	30	30	30	5 a.m.–11:30 p.m.	4 a.m.–12 a.m.
Local Bus	854	Grossmont Transit Center–Grossmont College	60	60	15	15	15	15	15	15	5:30 a.m.–7:30 p.m.	4 a.m.–12 a.m.
Local Bus	855	Rancho San Diego–La Mesa	30	30	15	15	15	15	15	15	6 a.m.–11 p.m.	4 a.m.–12 a.m.

Transit Leap Frequency and Span of Service

Service	Route	Description	Existing Frequency (in minutes)		2025 Frequency (in minutes)		2035 Frequency (in minutes)		2050 Frequency (in minutes)		Existing Span of Service	2050 Span of Service
			Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak		
Local Bus	856	SDSU–Cuyamaca College	30	30	15	15	15	15	15	15	4:30 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	864	El Cajon–East County Square	30	30	15	15	10	15	10	15	5 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	872	El Cajon Shuttle Loop Counter Clockwise	30	30	15	15	15	15	15	15	7 a.m.–7:30 p.m.	4 a.m.–12 a.m.
Local Bus	874	El Cajon Eastside Shuttle Clockwise	30	30	15	15	15	15	15	15	5 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	875	El Cajon Eastside Shuttle Counter Clockwise	30	30	15	15	15	15	15	15	5:30 a.m.–10 p.m.	4 a.m.–12 a.m.
Rural Bus	888	Jacumba Hot Springs–El Cajon	4 trips per week	--	4 trips per week	--	4 trips per week	--	4 trips per week	--	9:40 a.m.–6 p.m.	9:40 a.m.–6 p.m.
Rural Bus	891	Borrego Springs–El Cajon	2 trips per week	--	2 trips per week	--	2 trips per week	--	2 trips per week	--	7:30 a.m.–5:30 p.m.	7:30 a.m.–5:30 p.m.
Rural Bus	892	Borrego Springs–El Cajon	2 trips per week	--	2 trips per week	--	2 trips per week	--	2 trips per week	--	7:30 a.m.–5:30 p.m.	7:30 a.m.–5:30 p.m.
Rural Bus	894	Morena Village–El Cajon	4 trips daily	4 trips daily	4 trips daily	4 trips daily	4 trips daily	4 trips daily	4 trips daily	4 trips daily	5:30 a.m.–8 p.m.	5:30 a.m.–8 p.m.
Local Bus	901	Iris Transit Center–Downtown San Diego	15	30	15	15	10	15	10	15	4:30 a.m.–2:30 a.m.	4 a.m.–12 a.m.
Local Bus	904	Coronado Shuttle	0–60	60	30	30	30	30	30	30	10 a.m.–7 p.m.	4 a.m.–12 a.m.
Local Bus	905	Otay Mesa Transit Center–Iris Trolley	15–30	30	15	30	15	30	15	30	4 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	906	Iris Transit Center–Otay Mesa Transit Center	15	15	10	10	7.5	7.5	7.5	7.5	4 a.m.–2:30 a.m.	4 a.m.–12 a.m.
Local Bus	907	Iris Transit Center–San Ysidro CCW	15	15	10	10	7.5	7.5	7.5	7.5	4 a.m.–3 a.m.	4 a.m.–12 a.m.
Local Bus	909	Otay Mesa Transit Center–Southwestern College at Otay Mesa	60	60	30	60	30	60	30	60	5 a.m.–8 p.m.	4 a.m.–12 a.m.
Local Bus	916	Oak Park–Emerald Hills Loop Clockwise	30–60	30–60	15	15	15	15	15	15	5 a.m.–9:30 p.m.	4 a.m.–12 a.m.
Local Bus	917	Oak Park–Emerald Hills Loop Counter Clockwise	30–60	60	15	15	15	15	15	15	5 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	921	Mira Mesa	30	30	30	30	15	30	15	30	5:30 a.m.–8 p.m.	4 a.m.–12 a.m.
Local Bus	923	Downtown to Point Loma	30	30	15	15	10	15	10	15	5:30 a.m.–7:30 p.m.	4 a.m.–12 a.m.
Local Bus	928	Fashion Valley–Kearny Mesa	30	30	15	15	10	15	10	15	5 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	929	Iris Transit Center–12th and Imperial	12–15	13	10	13	10	13	10	13	4:30 a.m.–3 a.m.	4 a.m.–12 a.m.
Local Bus	932	Iris Transit Center–8th Street Transit Center	15	15	10	15	10	15	10	15	4:30 a.m.–12:30 a.m.	4 a.m.–12 a.m.
Local Bus	933	Iris Transit Center Loop–Imperial Beach Counter Clockwise	12–15	12	10	12	10	12	10	12	4:30 a.m.–12:30 a.m.	4 a.m.–12 a.m.
Local Bus	934	Iris Transit Center Loop–Imperial Beach Clockwise	12–15	12	10	12	10	12	10	12	4:30 a.m.–1 a.m.	4 a.m.–12 a.m.
Local Bus	936	Spring Valley–SDSU	30	30	15	15	10	15	10	15	5 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	944	Sabre Springs–Poway via Poway Road	30	30	30	30	30	30	30	30	5 a.m.–7:30 p.m.	4 a.m.–12 a.m.
Local Bus	945	Rancho Bernardo–Old Poway Park via Pomerado Road, Poway Road	30	30	30	30	30	30	30	30	5 a.m.–7:30 p.m.	4 a.m.–12 a.m.
Local Bus	955	National City–SDSU	12–14	12	10	15	10	15	10	15	5 a.m.–11:30 p.m.	4 a.m.–12 a.m.
Local Bus	961	24th Street Transit Center–Encanto Trolley	15–30	15–30	15	15	10	15	10	15	5 a.m.–10:30 p.m.	4 a.m.–12 a.m.
Local Bus	962	8th Street Transit Center–Spring Valley	15	15	10	15	10	15	10	15	5 a.m.–11 p.m.	4 a.m.–12 a.m.
Local Bus	963	8th Street Transit Center–Paradise Hills	30	30	15	15	10	15	10	15	5:30 a.m.–10 p.m.	4 a.m.–12 a.m.
Local Bus	964	Camino Ruiz and Capricorn Way–Alliant International University via Miramar College Transit Station	30	30	30	30	30	30	30	30	5:30 a.m.–8 p.m.	4 a.m.–12 a.m.
Local Bus	965	City Heights Circulator	35	35	15	15	15	15	15	15	5 a.m.–9 p.m.	4 a.m.–12 a.m.
Local Bus	967	24th Street Transit Center–Division and Ava	60	60	30	60	30	60	30	60	6 a.m.–8:30 p.m.	4 a.m.–12 a.m.
Local Bus	968	8th Street Transit Center–Plaza Bonita	60	60	30	60	30	60	30	60	5 a.m.–9 p.m.	4 a.m.–12 a.m.

Transit Leap Frequency and Span of Service

Service	Route	Description	Existing Frequency (in minutes)		2025 Frequency (in minutes)		2035 Frequency (in minutes)		2050 Frequency (in minutes)		Existing Span of Service	2050 Span of Service
			Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak	Peak	Off-Peak		
Local Bus	972	Sorrento Mesa Coaster Connection	45	--	30	60	20	60	20	60	7 a.m.–5 p.m.	4 a.m.–12 a.m.
Local Bus	973	Carroll Canyon Coaster Connection	45	--	30	60	20	60	20	60	7 a.m.–5 p.m.	4 a.m.–12 a.m.
Local Bus	974	UC San Diego Coaster Connection	45	--	30	60	20	60	20	60	7 a.m.–5 p.m.	4 a.m.–12 a.m.
Local Bus	978	Torrey Pines Coaster Connection	45	--	30	60	20	60	20	60	7 a.m.–5 p.m.	4 a.m.–12 a.m.
Local Bus	979	North University City Coaster Connection	45	--	30	60	20	60	20	60	7 a.m.–5 p.m.	4 a.m.–12 a.m.
Local Bus	984	Hillary Transit Center to SV via Carroll Canyon/Miramar Road Business Parks	--	--	--	--	20	60	20	60	--	4 a.m.–12 a.m.
Local Bus	985	UC San Diego to Torrey Pines Shuttle	--	--	15	--	10	--	10	--	--	4 a.m.–12 a.m.
Local Bus	992	Airport/Downtown Shuttle	15	15	10	10	10	10	10	10	5 a.m.–12:30 a.m.	4 a.m.–12 a.m.
Local Bus	993	Shelter Island to Convention Center Shuttle	--	--	--	--	--	--	10	10	--	4 a.m.–12 a.m.

Appendix A Attachment 2:

California Assembly Bill 805: Strategies to Reduce Pollution Exposure in Disadvantaged Communities

Appendix A Attachment 2: California Assembly Bill 805 Strategies to Reduce Pollution Exposure in Disadvantaged Communities

Overview

The Vision for San Diego Forward: The 2021 Regional Plan (2021 Regional Plan) reimagines the transportation system using a data-driven planning process and the 5 Big Moves—inter-reliant strategies that provide a regional system of Complete Corridors that are managed in real time by the Next Operating System (Next OS) to create capacity and keep the transportation system operating smoothly and safely for all modes. Transit Leap and Flexible Fleet services connect a network of Mobility Hubs that covers the region's population centers, major employment centers, and other key activity centers across the region.

The 2021 Regional Plan integrates the 5 Big Moves to meet state and local mandates, address traffic congestion, and create equitable access to jobs, education, healthcare, and other community resources. In addition, California Assembly Bill 805 (Gonzalez Fletcher, 2017, Chapter 658) (AB 805) requires, among other things, that the 2021 Regional Plan identify disadvantaged communities and include transportation strategies to reduce pollution exposure in these communities.

Defining Disadvantaged Communities

In accordance with AB 805, SANDAG has identified the location of disadvantaged communities as designated pursuant to Section 39711 of the Health and Safety Code. The California Office of Environmental Health Hazard Assessment has developed a screening tool—the California Communities Environmental Health Screening Tool, or CalEnviroScreen 3.0—for designating these communities. This statewide tool evaluates multiple pollutants and stressors at the Census tract level. CalEnviroScreen provides a snapshot of existing conditions based on historical data; it does not forecast future conditions for disadvantaged communities. SANDAG used the data to identify the projects, strategies, and programs included in the 2021 Regional Plan that reduce pollution exposure for those impacted communities.

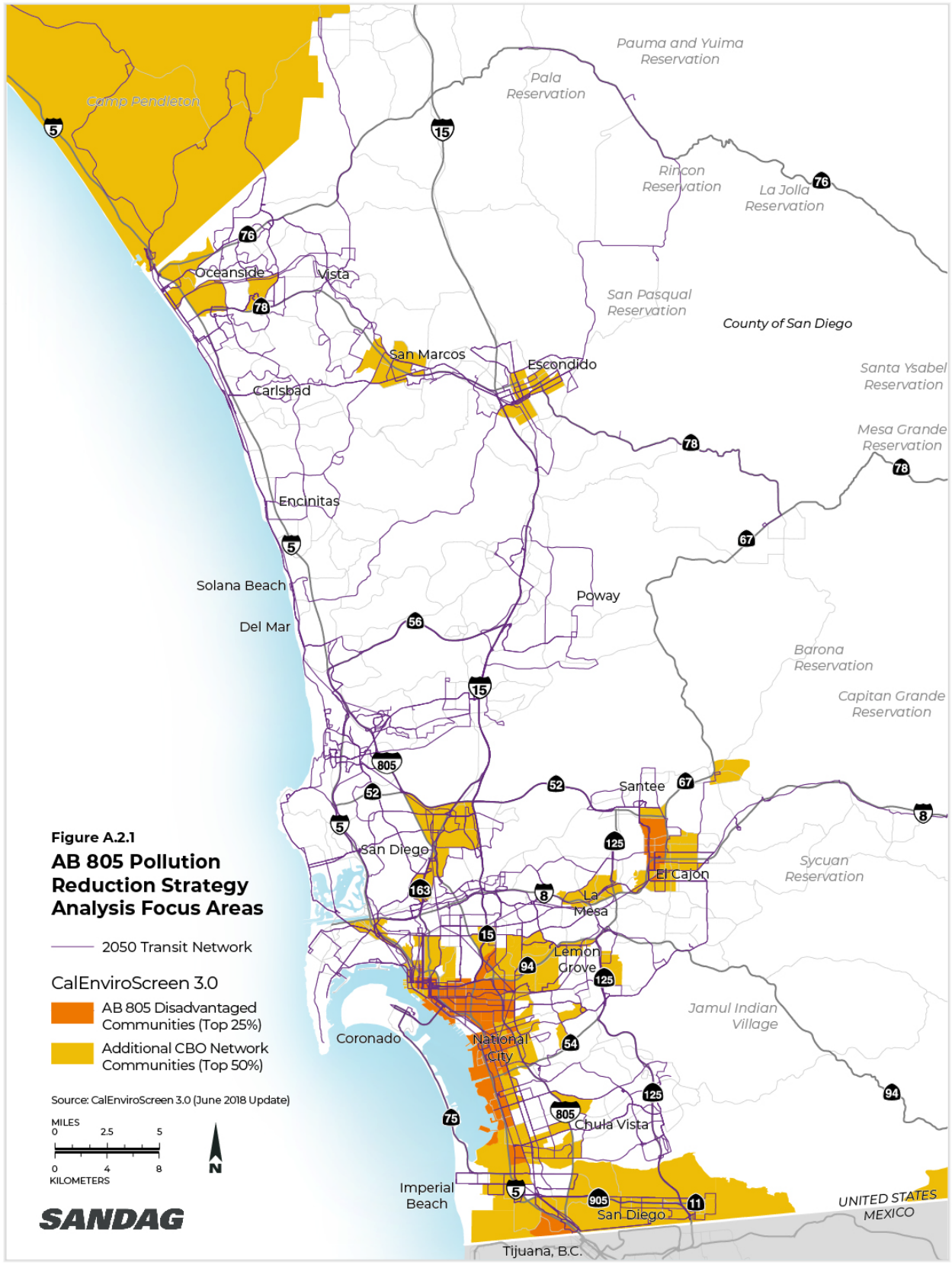
Using CalEnviroScreen, SANDAG has mapped the communities in the region that meet the pollution exposure and demographic characteristics of disadvantaged communities. Figure A2.1 shows the disadvantaged communities in the San Diego region. Aligning with the California Environmental Protection Agency's Designation of Disadvantaged

Communities Pursuant to Senate Bill 535 (De León, 2012) (SB 535),[1] the 2021 Regional Plan identifies the most vulnerable 25% of communities on the environmental/socioeconomic vulnerability scale and includes transportation strategies to reduce pollution exposure in those communities. However, with the understanding that there are communities in the region with varying levels of vulnerability, SANDAG completed an additional analysis to include Census tracts ranking in the top 50% of CalEnviroScreen scores. This additional consideration is inclusive of communities the 2021 Regional Plan Community-Based Organization (CBO) network serves.

The 2021 Regional Plan Social Equity Working Group (Working Group) provided input on the development of the 2021 Regional Plan from a social equity perspective. The Working Group provided input on various steps in the development of the 2021 Regional Plan, including gathering input on the mobility needs of each community, defining the performance measures used for the social equity analysis, and providing input about how the AB 805 analysis was conducted for the 2021 Regional Plan. Working Group members provided input on the methodology for defining disadvantaged communities and the version of CalEnviroScreen to use. At the time the plan was drafted, CalEnviroScreen 3.0 was the adopted version of the tool. A draft of CalEnviroScreen version 4.0 was not released until late February 2021, so this analysis relies on the adopted version 3.0 of the tool to identify disadvantaged communities.

[1] "Designation of Disadvantaged Communities Pursuant to Senate Bill 535 (De León)," California Environmental Protection Agency, April 2017, calepa.ca.gov/wp-content/uploads/sites/6/2017/04/SB-535-Designation-Final.pdf.

Figure A2.1: AB 805 Pollution-Reduction Strategy Analysis Focus Areas



Transportation Strategies to Reduce Pollution Exposure

Pollution-reduction measures in the 2021 Regional Plan include projects, policies, and programs that all work together to implement the transportation network, as detailed in this appendix.

Critical to implementing these pieces of the plan is the SANDAG Regional Social Equity Planning Framework. The 2021 Regional Plan establishes a framework for how SANDAG approaches, incorporates, and prioritizes social equity in all SANDAG plans, programs, and projects. SANDAG will partner to advance investments in communities that have been historically underserved and underrepresented—those who have been systemically marginalized and impacted by actions and inactions at all levels of our government and society. This includes people with low incomes, people of color, people with disabilities, and people with limited English proficiency. While the projects listed below are specific to the identified disadvantaged communities, the policies and programs apply more generally and do not specifically allocate or apply to any particular community. It is therefore important to understand how SANDAG will distribute funding in the future and to fully integrate the Social Equity Planning Framework into any methodology or formula for distributing funds or implementing programs.

While it should be noted that the 2021 Regional Plan includes network improvements for all modes of transportation, and the projects are intended to work as a system to benefit mobility, congestion, and equity, some of the projects—on their own—would not necessarily reduce pollution. Therefore, those transportation projects that, either alone or as they function within the transportation system, reduce pollution are listed in Tables A2.1 and A2.2. Following the transportation project list is a description of the Regional Plan policies and how they could be implemented to reduce pollution exposure, and finally the programs (grants) that could be applied in disadvantaged communities to reduce pollution exposure.

Transportation Projects

Table A2.1 shows projects benefitting communities in the highest scoring 25% Census tracts of CalEnviroScreen. They are ordered by type and alphabetical by jurisdiction. The latest year in which the project will be operating is provided in parentheses next to each project name. Similarly, Table A2.2 lists projects benefitting communities in the additional analysis and is organized in the same manner. Because the analysis of projects is based on the Census tract level, some communities will be included in both Table A2.1 and Table A2.2.

Following Tables A2.1 and A2.2, maps of the transit and active transportation projects are shown in Figures A2.2–A2.7.

Table A2.1: Transit and Active Transportation Projects Located in Disadvantaged Communities (Top 25%)

Transit and Active Transportation Projects Located in Disadvantaged Communities
Top 25%
Chula Vista
Mobility Hub
• Downtown Chula Vista Mobility Hub • Southwest Chula Vista Mobility Hub
Transit Lines
• *Rapid* 630 (2035) • *Rapid* 640 (2035) • *Rapid* 709 (2035)
Active Transportation Projects
• Bayshore Bikeway Upgrades (2035) • Chula Vista (J Street) (2035) • Chula Vista Greenbelt (2050)
City of San Diego
Barrio Logan
Mobility Hub
• Urban Core Mobility Hub*
Transit Lines
• *Rapid* 12 (2025) • *Rapid* 637 (2035) • *Rapid* 910 (2035)
Active Transportation Projects
• Chollas Creek Bikeway: Bayshore Bikeway to University Bikeway and South Fork – Petway Park to Market Creek Plaza (2050)
City Heights
Mobility Hub
• Urban Core Mobility Hub*
Transit Lines
• Commuter Rail 582 (2035)
Active Transportation Projects
• Central Avenue Bikeway (2025)
Downtown
Mobility Hub
• Urban Core Mobility Hub*
Transit Lines
• Commuter Rail 581 (2050) • Commuter Rail 583 (2050) • Tram 555 (2050) • *Rapid* 12 (2025) • *Rapid* 630 (2035)

Transit and Active Transportation Projects Located in Disadvantaged Communities
Top 25%
• *Rapid* 640 (2035) • *Rapid* 910 (2035)
Active Transportation Projects
• North Park to Downtown (2035) • Centre City – La Mesa Corridor (2035) • Downtown San Diego to Encanto (2035) • Downtown to Southeast (2035)
Eastern Area
Transit Lines
• *Rapid* 10 (2025) • *Rapid* 625 (2035)
Active Transportation Projects
• Chollas Creek Bikeway: Bayshore Bikeway to University Bikeway and South Fork – Petway Park to Market Creek Plaza (2050)
Encanto
Mobility Hub
• Southeast San Diego Mobility Hub*
New Transit Lines
• Commuter Rail 582 (2035) • *Rapid* 12 (2025) • *Rapid* 625 (2035)
Active Transportation Projects
• Centre City – La Mesa Corridor (2035) • Chollas Creek Bikeway: Bayshore Bikeway to University Bikeway and South Fork – Petway Park to Market Creek Plaza (2050) • City Heights/Fairmount Corridor (2035) • Encanto to Chula Vista National City Connections (2035)
Greater Golden Hill
Mobility Hub
• Urban Core Mobility Hub*
Transit Lines
• Tram 555 (2050) • *Rapid* 235 (2035) • *Rapid* 637 (2035)
San Ysidro
Mobility Hub
• San Ysidro Mobility Hub*
Transit Lines
• *Rapid* 640 (2035)

Transit and Active Transportation Projects Located in Disadvantaged Communities
Top 25%
Southeastern San Diego
Mobility Hub
• Urban Core Mobility Hub* • Southeast San Diego Mobility Hub*
Transit Lines
• Tram 555 (2050) • *Rapid* 12 (2025) • *Rapid* 637 (2035)
Active Transportation Projects
• Chollas Creek Bikeway: Bayshore Bikeway to University Bikeway and South Fork – Petway Park to Market Creek Plaza (2050) • Downtown San Diego to Encanto (2035)
Uptown
Mobility Hub
• Urban Core Mobility Hub*
El Cajon
Mobility Hub
• El Cajon Mobility Hub
Transit Lines
• *Rapid* 292 (2035) • *Rapid* 870 (2035) • *Rapid* 890 (2035)
Active Transportation Projects
• Santee – El Cajon Corridor (2050) • East County Northern Loop (2050)
National City
Mobility Hub
• National City Mobility Hub
Transit Lines
• Commuter Rail 582 (2035) • Commuter Rail 583 (2050) • *Rapid* 625 (2035) • *Rapid* 630 (2035)
Active Transportation Projects
• Encanto to Chula Vista National City Connections (2035)

* Indicates Mobility Hub overlaps more than one jurisdiction.

Table A2.2: Transit and Active Transportation Projects Located in CBO Network Communities (Top 50%)

Transit and Active Transportation Projects Located in CBO Network Communities
Top 50%
Chula Vista
Transit Lines
• Commuter Rail 582 (2050) • Commuter Rail 583 (2050) • *Rapid* 293 (2050) • *Rapid* 625 (2035) • *Rapid* 635 (2050)
Active Transportation Projects
• Bay to Ranch Bikeway (2050) • I-805 Connector – Bonita Road to Floyd Avenue (2050)
City of San Diego
Balboa Park
Active Transportation Projects
• Pershing Bikeway (2025) • North Park to Downtown (2035) • El Prado: Cross-Park (2035)
City Heights
Mobility Hub
• City Heights Station
Transit Lines
• Commuter Rail 581 (2050) • *Rapid* 10 (2025)
Active Transportation Projects
• City Heights/Fairmount Corridor (2035) • North Park/Mid-City Bikeways: Orange Bikeway (2025)
Downtown
Transit Lines
• Commuter Rail 398 (2025) • Commuter Rail 581 (2050)
Active Transportation Projects
• Bayshore Bikeway Upgrades (2035)
Encanto
Active Transportation Projects
• Encanto, Lincoln Heights to Lemon Grove (2035)
Greater Golden Hill
Active Transportation Projects
• Pershing Bikeway (2025)

Transit and Active Transportation Projects Located in CBO Network Communities

Top 50%

Kearny Mesa

New Transit Stations and Mobility Hub

- Kearny Mesa Mobility Hub

Transit Lines

- Commuter Rail 582 (2035)
- *Rapid* 28 (2035)
- *Rapid* 120 (2035)
- *Rapid* 292 (2025)
- *Rapid* 295 (2035)
- *Rapid* 630 (2035)
- *Rapid* 890 (2035)
- Local Bus Route 668 (through Murphy Canyon with eight new stops)
- Local Bus Route 649 (between Ruffner Street and Overland Avenue with 17 new stops)

Active Transportation Projects

- Kearny Mesa to Beaches Corridor – Linda Vista Road to I-15 Bikeway (2050)
- I-15 Bikeway – Murphy Canyon to Affinity Court (2050)
- SR 52 Bikeway – I-5 to Santo Road (2050)

Linda Vista

Mobility Hub

- Mission Valley Mobility Hub*

Transit Lines

- *Rapid* 28 (2035)
- *Rapid* 41 (2035)
- *Rapid* 120 (2035)

Active Transportation Projects

- Clairemont – Centre City Corridor (2050)

Midway–Pacific Highway

Mobility Hub

- Urban Core Mobility Hub*

Transit Lines

- Commuter Rail 581 (2050)
- Commuter Rail 581B (2050)
- Commuter Rail 583 (2050)
- *Rapid* 10 (2025)
- *Rapid* 28 (2035)
- *Rapid* 640 (2035)

Active Transportation Projects

- Pacific Coast Highway/Central Mobility Bikeway (2035)

Mission Valley

Mobility Hub

- Mission Valley Mobility Hub*

Transit and Active Transportation Projects Located in CBO Network Communities

Top 50%

Old Town

Active Transportation Projects

- Uptown Bikeways: Mission Hills and Old Town Bikeways (2025)
- Coastal Rail Trail San Diego – Pacific Highway (Fiesta Island Road to Taylor Street) (2035)

Otay Mesa

Mobility Hub

- San Ysidro Mobility Hub*

Transit Lines

- Commuter Rail 582 (2050)
- Commuter Rail 583 (2050)
- *Rapid* 292 (2035)
- *Rapid* 638 (2050)
- *Rapid* 950 (2025)
- Local Bus Route 661 (between Heritage Road and Alta Road with 13 new stops)

Active Transportation Projects

- SR 905 Corridor (2050)
- SR 125 Connector – Bonita Road to U.S.–Mexico Border (2050)

Otay Mesa–Nestor

Mobility Hub

- Imperial Beach Mobility Hub*

Transit Lines

- *Rapid* 293 (2050)
- *Rapid* 630 (2035)
- *Rapid* 950 (2025)

Active Transportation Projects

- Bayshore Bikeway: Segment 8B Main Street to Ada Street (2035)

San Ysidro

Mobility Hub

- San Ysidro Mobility Hub*

Transit Lines

- Commuter Rail 582 (2050)
- *Rapid* 28 (2035)
- *Rapid* 120 (2035)
- *Rapid* 630 (2035)

Active Transportation Projects

- Border Access Corridor (2050)
- SR 905 Corridor (2050)

Skyline-Paradise Hills

Transit Lines

- *Rapid* 12 (2025)

Transit and Active Transportation Projects Located in CBO Network Communities
Top 50%
Uptown
Mobility Hub
• Hillcrest Station
Transit Lines
• Commuter Rail 581 (2050) • Tram 555 (2050) • *Rapid* 10 (2025) • *Rapid* 120 (2035) • *Rapid* 630 (2035)
Active Transportation Projects
• City Heights – Old Town Corridor (2035) • El Prado: Cross-Park (2035)
El Cajon
Transit Lines
• Commuter Rail 581 (2050) • *Rapid* 292 (2035)
Escondido
Mobility Hub
• Escondido Mobility Hub
Transit Lines
• *Rapid* 440 (2035) • *Rapid* 471 (2035)
Active Transportation Projects
• I-15 Bikeway – Citracado Parkway to Country Club Lane (2050)
Imperial Beach
Mobility Hub
• Imperial Beach Mobility Hub*
La Mesa
Mobility Hub
• La Mesa Mobility Hub
Active Transportation Projects
• Hillcrest – El Cajon Corridor (2035)
Lakeside (San Diego County)
Active Transportation Projects
• I-8 Corridor – San Diego River Trail to Olde Highway 80 (2050)
Lemon Grove
Mobility Hub
• Lemon Grove Mobility Hub

Transit and Active Transportation Projects Located in CBO Network Communities
Top 50%
Active Transportation Projects
• Centre City – La Mesa Corridor (2035) • Encanto, Lincoln Heights to Lemon Grove (2035)
Oceanside
Mobility Hub
• Oceanside Mobility Hub
Transit Lines
• *Rapid* 473 (2035) • *Rapid* 474 (2035) • *Rapid* 477 (2035)
Active Transportation Projects
• Inland Rail Trail: Oceanside (2035) • El Camino Real (2050)
San Marcos
Mobility Hub
• San Marcos Mobility Hub
Transit Lines
• *Rapid* 440 (2035) • *Rapid* 450 (2025) • Local Bus Route 448 (between Palomar College and California State University San Marcos with three new stops) • Local Bus Route 449 (five new stops)
Active Transportation Projects
• Carlsbad – San Marcos Corridor (2050) • Encinitas to San Marcos Corridor – Double Peak Drive to San Marcos Boulevard (2050)
Camp Pendleton
Transit Lines
• Commuter Rail 398 (2035)
Active Transportation Projects
• Camp Pendleton Trail (2050)

* Indicates Mobility Hub overlaps more than one jurisdiction.

Figure A2.2: AB 805 Pollution Reduction Strategies: Regional Bike Network Projects (North County)

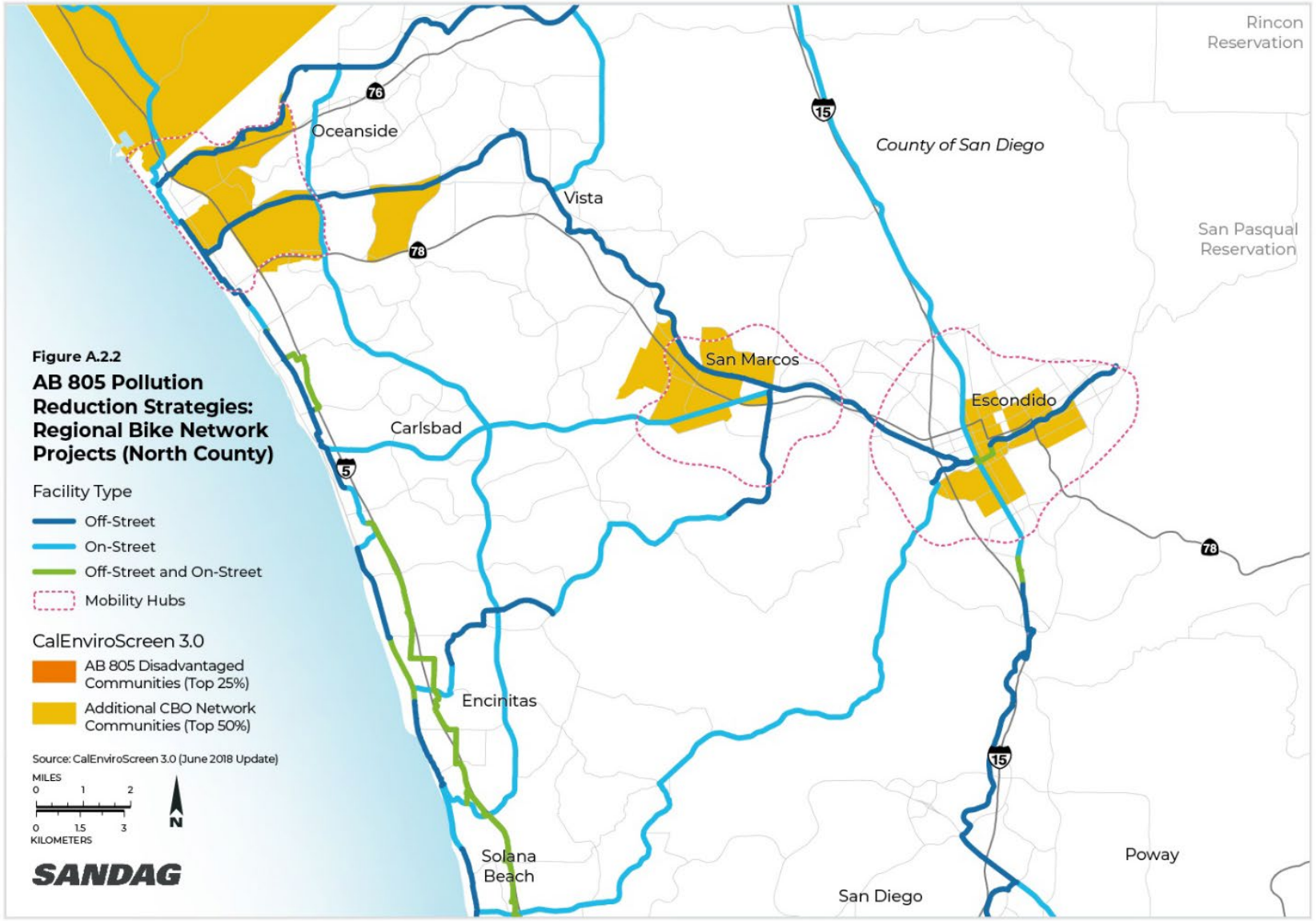


Figure A2.3: AB 805 Pollution Reduction Strategies: Regional Bike Network Projects (Central)

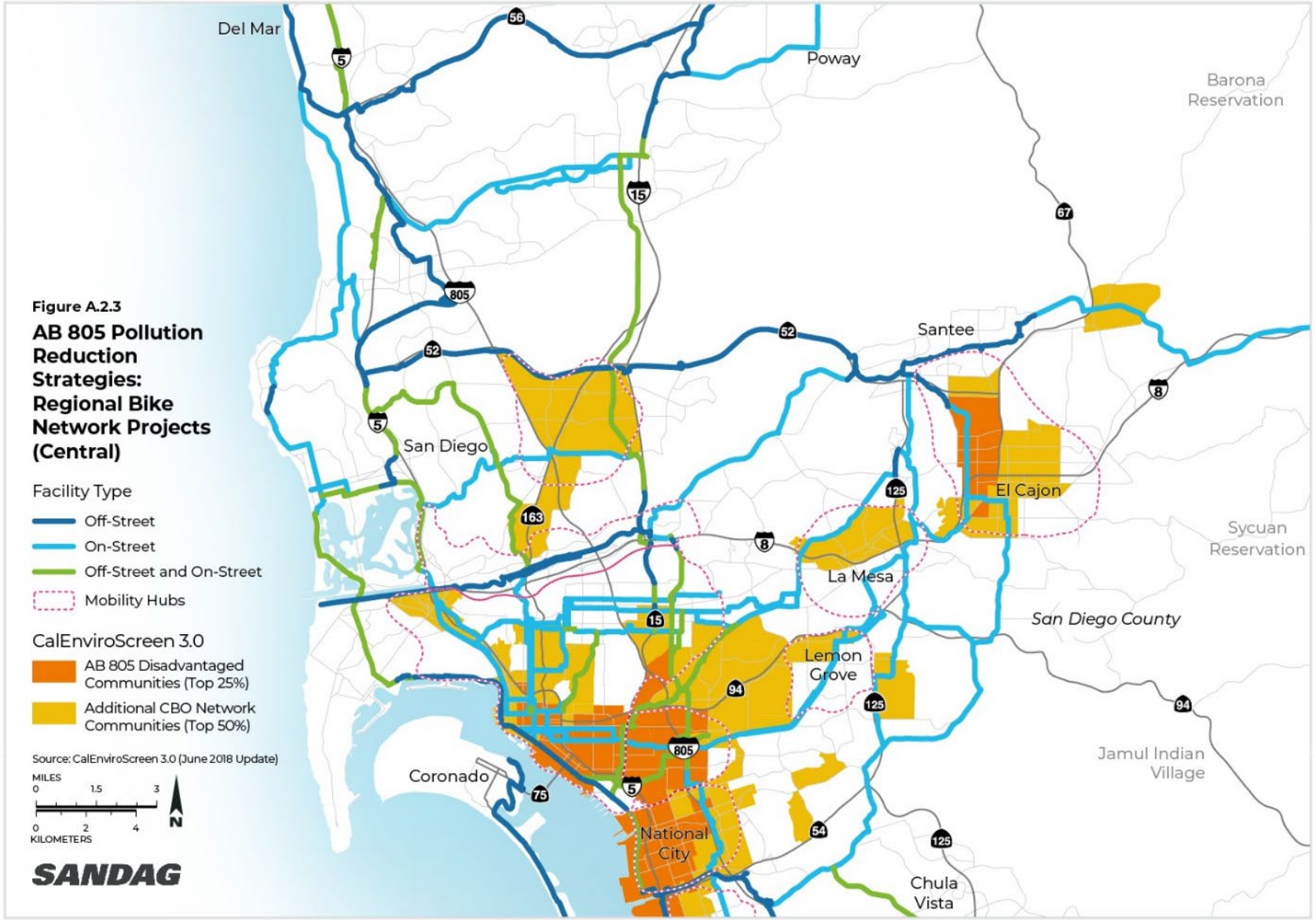


Figure A2.4: AB 805 Pollution Reduction Strategies: Regional Bike Network Projects (South County)

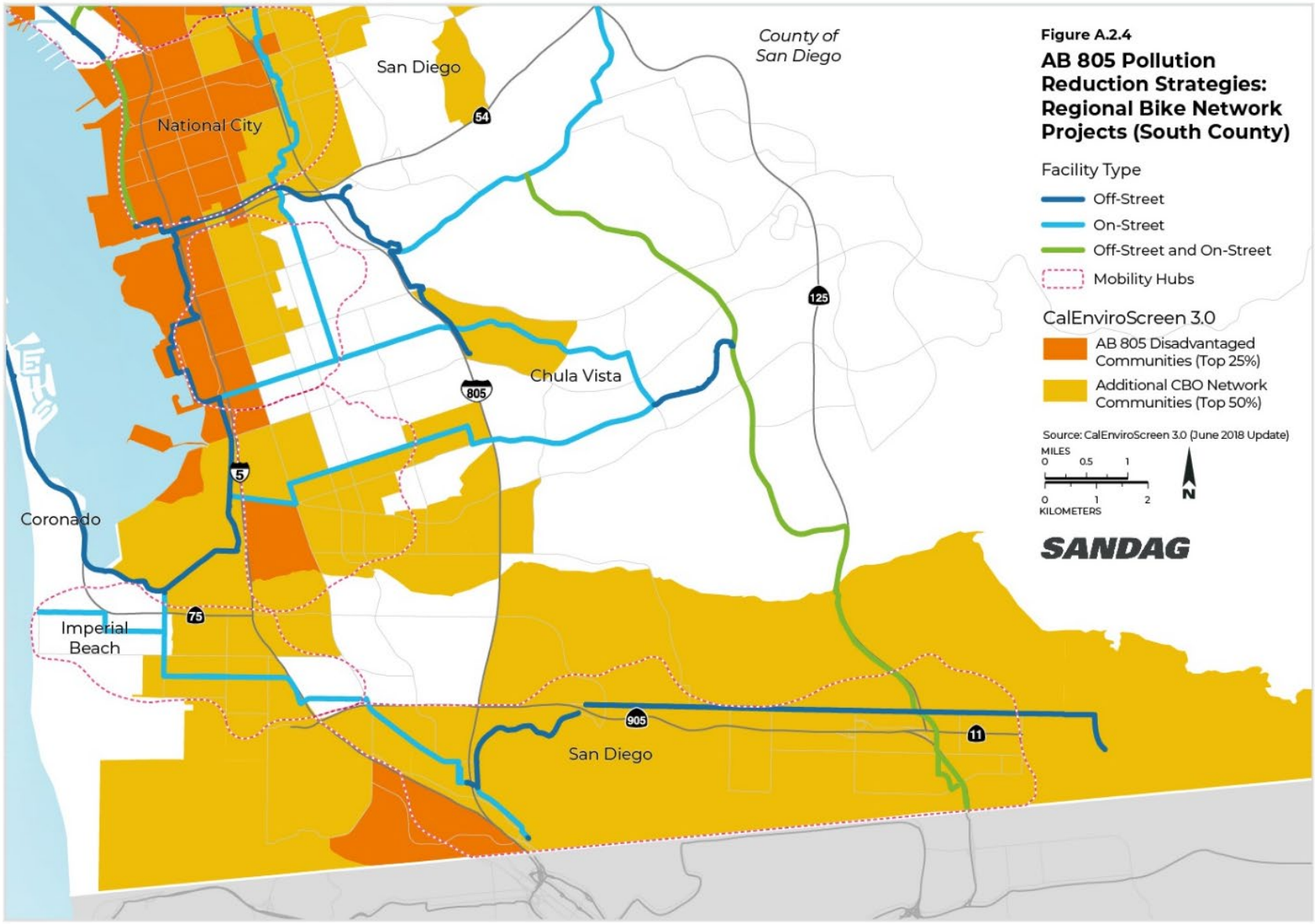


Figure A2.5: AB 805 Pollution Reduction Strategies: Transit Projects (North County)

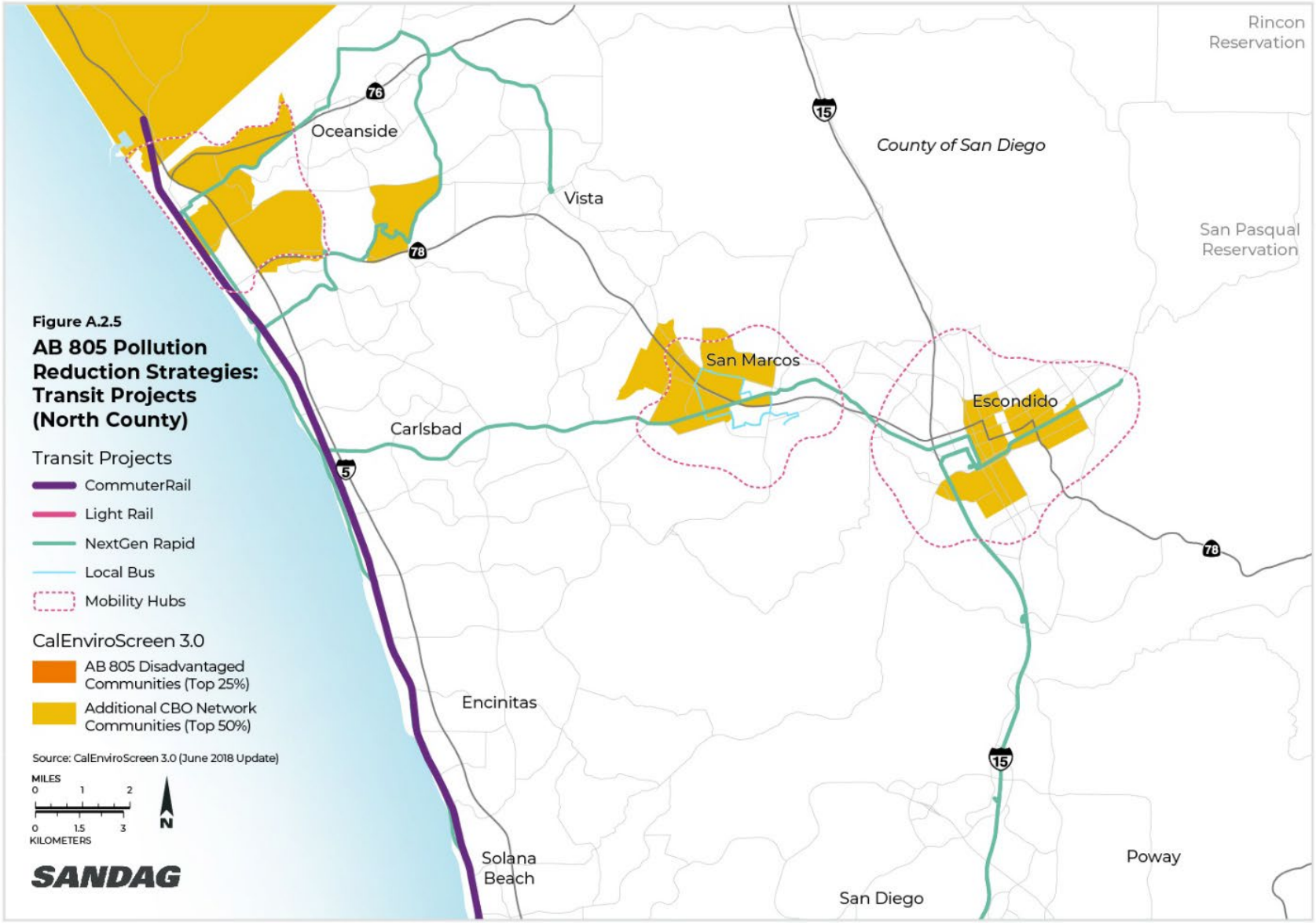


Figure A2.6: AB 805 Pollution Reduction Strategies: Transit Projects (Central)

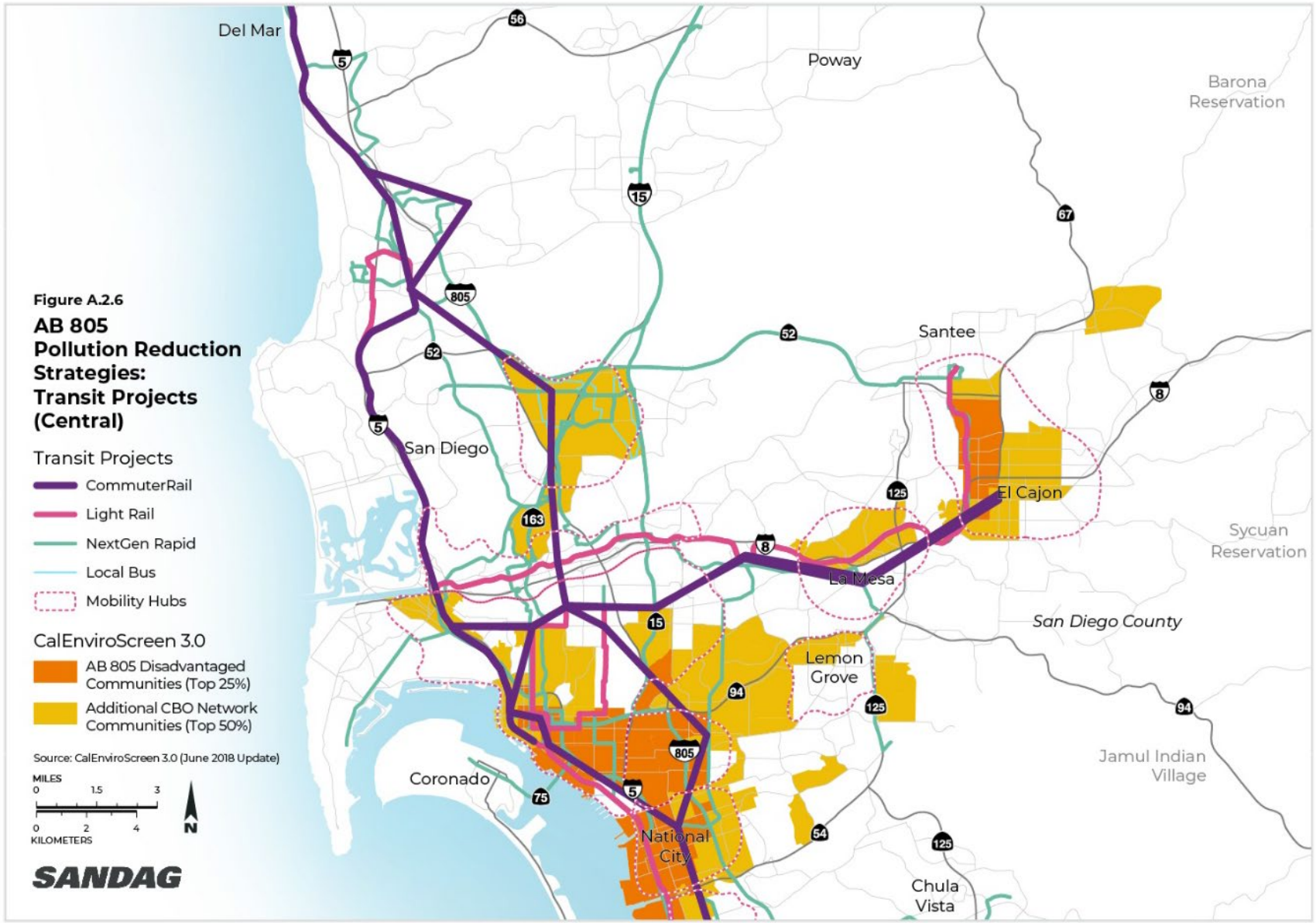
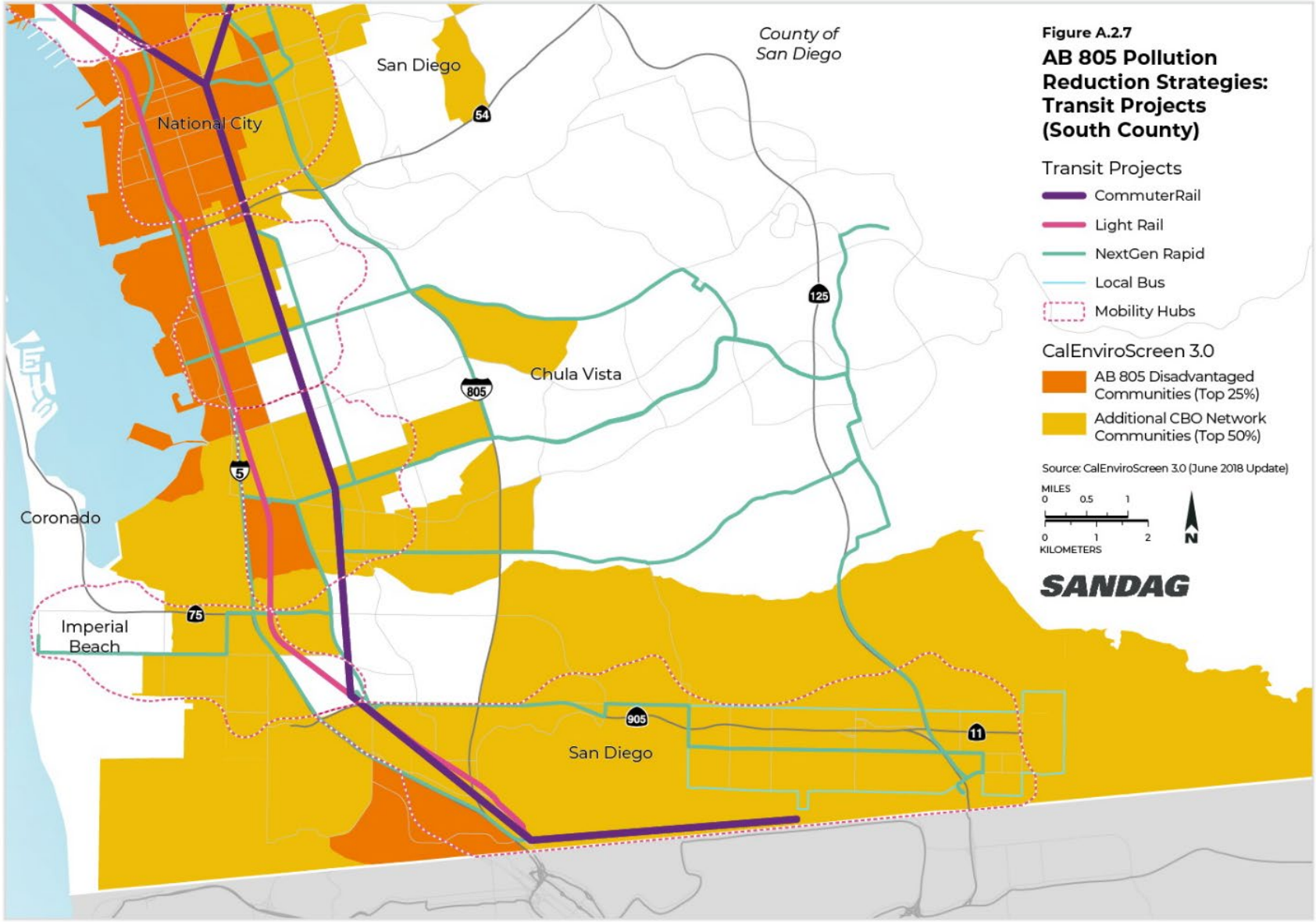


Figure A2.7: AB 805 Pollution Reduction Strategies: Transit Projects (South County)



In addition to the project list, the transportation and active transportation networks will benefit from service enhancements and upgrades that are not identified on the list of projects. Specifically, the Transit Leap category of projects create a complete network of fast, high-capacity, high-frequency transit services that connect communities to employment centers, healthcare facilities, and other important destinations throughout the San Diego region. Some of these projects build upon the existing transit services with upgrades to transit stations and increased frequencies. The light rail lines currently in operation will receive major enhancements in service through grade separation and double- or triple-tracking for higher frequency operations. Seeing that many of the light rail routes operate in disadvantaged communities, grade separation will reduce the communities' pollution exposure by alleviating traffic congestion while allowing rail service to operate more frequently without having to stop for local traffic.

At the center of this network are new commuter rail services that will provide faster, more frequent services for longer regional trips, while faster and more frequent light rail, *Rapid*, and local bus routes provide viable alternatives to driving for local trips. Commuter rail uses higher speed trains (more than 100 miles per hour) in tunnels or on bridges with trains arriving every 8–10 minutes all day. More than 30 new *Rapid* bus routes operating at 10-minute frequency will serve disadvantaged communities in addition to local bus routes running at the same frequency. Ultimately, these transit lines connect with the 31 Mobility Hubs that serve communities with a high concentration of people, destinations, and travel choices spanning one, two, or a few miles based on the community characteristics and tailored specifically to the needs of the community.

Mobility Hubs offer on-demand travel options and supporting infrastructure that enhance connections to high-quality Transit Leap services while helping people make short trips around the community on Flexible Fleets. SANDAG recognizes that new transit services and stations alone will not address the air pollution burden disadvantaged communities face, but when coupled with electrification, they can help reduce air pollution emission and exposure. This is why one key feature of the Mobility Hubs will be the availability of electric shared vehicle fleets and charging stations.

In conjunction with the transportation network, projects within the Regional Bike Network will also provide pollution exposure reduction benefits for disadvantaged communities and the entire region. The 2021 Regional Plan provides almost 400 miles of bike facility upgrades and new construction to establish a safe network, making it easier to get around and providing a significant contribution to social equity efforts along with the environmental benefits.

SANDAG recognizes that, in some cases, the existing street design, such as bike lanes and routes that share the road with vehicular traffic, may not be comfortable for all to use. With that in mind, we design all of our active transportation projects to international best practices in creating safe and comfortable places for every person to walk and bike, implementing facilities like protected bikeways and heavily traffic-calmed streets. The

projects will, when complete, provide a fully interconnected network of active transportation facilities that connect people from the beginning of their trip to the end.

SANDAG is working to implement an active transportation network that serves regional trips and heavily traveled local corridors. Interconnected with this, SANDAG member agencies are working to build out a much finer network of bike facilities along local streets that support and function in concert with the SANDAG Regional Bike Network.

A more robust, reliable, and faster transit and active transportation network would help create more equitable access to jobs, education, and healthcare, particularly for disadvantaged communities, all while reducing reliance on use of single-occupancy vehicles.

Regional Plan Policies

SANDAG has developed 11 implementation strategies outlining actions that will be taken to achieve the goals of the 2021 Regional Plan. How these strategies are implemented will have an important effect on pollution exposure reduction in disadvantaged communities in the region. Social equity is a key factor in developing methodologies for each of these strategies, and while some of these methodologies are yet to be developed, others are already being implemented. SANDAG will reevaluate these in light of the Regional Social Equity Planning Framework and SANDAG's Commitment to Equity statement. While all of the policies are summarized below, a complete description of each policy, the near- and long-term implementation actions, program costs, and social equity considerations are included in Appendix B: Implementation Actions.

Below is a list of the policies, including a brief description of how social equity is being considered for each and how the policy could reduce pollution exposure in disadvantaged communities.

Land Use and Regional Growth – The 2021 Regional Plan vision for land use focuses on development and growth in Mobility Hub areas to preserve the region's open space and support transportation investments by reducing vehicle miles traveled. SANDAG will consider how land use programs, projects, and policies it supports address social equity in relation to regional access to affordable housing, proximity to jobs and transit, opportunities for residents to live where they work and play, convenient access to multimodal transportation options, and other opportunities for work, commerce, and recreation.

Land use is the foundation in determining what is built where and how transportation systems connect work, home, and recreation. Ensuring equitable development starts with considering equity in land use decisions and patterns. By coordinating equity, land use, and transportation, we can better understand where historically marginalized communities are located, how to better connect them with opportunities throughout the region, and enable residents to accomplish daily needs without traveling long distances, thereby contributing toward pollution exposure reduction. Because land use authority is reserved to local jurisdictions, SANDAG will leverage partnerships with cities and the county through the Smart Growth Incentive Program and other grants to provide funds

for transportation-related improvements and planning efforts that support smart growth in Mobility Hubs to realize this vision.

Housing – California is experiencing a housing crisis, with housing demand far outstripping supply. The 2021 Regional Plan addresses the housing crisis through Mobility Hubs, bringing where people live and work closer together and providing more housing options for more San Diegans through increased density. SANDAG will rely on building strong partnerships with local jurisdictions to increase housing in the region, especially housing available to low-income residents. Through grant programs and technical support, SANDAG will serve as a funding partner and resource to assist local jurisdictions in reaching the region's housing production goals.

While affordable housing has been concentrated in many disadvantaged communities, the goal of this policy is to ensure fairness throughout the region and to not overburden select communities. Providing adequate housing near employment areas can shorten trips and help reduce pollution exposure, but existing deficiencies in communities should be considered before new housing is added. SANDAG is studying ways to accelerate housing production without displacing low-income residents in communities where housing growth occurs and will increase equity in the region by furthering fair housing in resource-rich areas to provide low-income residents with greater access to jobs, educational opportunities, and other resources.

Climate Action Planning – To help reach regional and state greenhouse gas (GHG) emissions reduction targets, the 2021 Regional Plan focuses heavily on the conversion to clean transportation and a shift from personal vehicle dependency through the 5 Big Moves. To help local jurisdictions make this transition and achieve broader reductions in GHG emissions, SANDAG will provide technical assistance, guidance resources, templates, and grant funding to incorporate the 5 Big Moves and Sustainable Communities Strategy actions into their climate action plans (CAPs) and plan for more well-connected, sustainable, healthy communities that are accessible to all.

SANDAG recognizes that all residents, regardless of age, race, or income, deserve to live in safe and healthy communities and that climate impacts disproportionately affect low-income populations and communities of color. SANDAG will consider climate impacts and the equitable distribution of funding and program assistance for all communities across the region.

Climate Adaptation and Resilience – The San Diego region is anticipated to feel the effects of climate change through hotter and more frequent heat waves, prolonged droughts, increased wildfires, rising sea levels, and destructive storm surges. The 2021 Regional Plan aims to better prepare San Diego communities for these climate change impacts by considering evacuation and rapid mobility needs in our transit corridors, evaluating and considering climate vulnerabilities to the region's transportation infrastructure, and utilizing natural lands and conservation to absorb and protect against climate change impacts.

SANDAG will establish a coordinated effort across agencies and local jurisdictions for more holistic, comprehensive, equitable, sustainable, and resilient communities.

SANDAG recognizes that climate change affects everyone, with low-income and communities of color disproportionately feeling those effects. Regional resilience is only possible if all communities and populations are prepared. The 2021 Regional Plan seeks to equitably prioritize climate resilience projects and increase public awareness of climate change across San Diego County. SANDAG will promote climate resilience projects through the Resilient Capital Grants and Innovative Solutions program, prioritizing communities most vulnerable to the impacts of climate change.

Electric Vehicles – The adoption of electric vehicles (EVs) regionwide is a key player in the 5 Big Moves of the 2021 Regional Plan as a way to reach regional GHG emission-reduction targets. EVs are zero-emission vehicles that include plug-in battery EVs and hydrogen fuel cell EVs. SANDAG aims to incentivize and encourage the incorporation of all types of EVs into Flexible Fleets, Transit Leap, and goods movement and support funding programs that increase EV charging stations throughout the region and within Mobility Hubs and as part of the Complete Corridor strategy.

Regionwide adoption of EVs requires affordable and convenient access to zero-emission options for all residents. The charger incentive program currently reserves a minimum of 25% of funds for installations in disadvantaged communities and will explore increases to this amount through program updates. The vehicle incentive program plans to prioritize rebate funds for low- and moderate-income households. The new regional EV strategy that will be developed through the Accelerate to Zero Emissions Collaboration with regional partners will include engagement with CBOs and address social equity considerations in its purpose, policies, and recommendations. The Collaboration's steering committee also includes representatives from two equity-focused organizations. SANDAG is also committed to coordinating with regional stakeholders to accelerate the transition to zero-emission buses and trucks to meet state climate and environmental goals. As SANDAG develops clean transportation pilot projects, benefits accrued to disadvantaged communities will be a factor in determining pilot locations.

Parking and Curb Management – Proactively managing parking and curb space enables more people to access places within our communities using alternatives to driving. Effective parking-management policies contribute to the region's ability to meet the California Senate Bill 375 (Steinberg, 2008) GHG-reduction targets by applying parking pricing and reduced parking supply assumptions. In addition, the 2021 Regional Plan addresses curb management by proposing strategies to help balance competing and changing travel needs at the curb while remaining flexible to resident, employee, business, and visitor needs. While the authority to implement parking and curb policies remains with local jurisdictions, SANDAG plays a unique role of informing these policies by sharing resources and best practices and serving as the regional Mobility Data Clearinghouse. Proactively managing parking and curb space enables more people to access places within our communities using alternatives to driving.

SANDAG considers how parking and curb management can address social equity and how all residents in the San Diego region can benefit from its potential impacts. Such policies can enable affordable housing development and create equitable curb space for all travelers, including those who depend on modes like transit, biking, or other Flexible Fleets. These alternatives to driving alone not only enable less required parking but can also reduce pollution exposure as trips are shifted to cleaner modes. SANDAG will ensure that pricing strategies are implemented in coordination with more convenient and accessible travel choices and mobility incentive programs as they become available.

Transportation Demand Management – Transportation Demand Management (TDM) innovations have the potential to transform the way people travel within and between communities. Managing demands on the existing transportation system is a vital strategy for making the overall system more effective in reducing drive-alone commute trips. SANDAG will continue to administer and monitor the iCommute program by providing regional rideshare, employer outreach, and bike education and secure parking services to help reduce commute-related traffic congestion and vehicle miles traveled. Beyond commute trips, TDM programs are expanded to include grants and incentives that make it easier and safer to use active modes for short trips.

SANDAG recognizes that all residents throughout the region deserve convenient, safe, and affordable commute options and will ensure equitable distribution of funding and incentive program assistance. Additionally, SANDAG commuter programs will design options for low-income or unbanked residents while ensuring marketing, outreach, and education efforts reach underrepresented populations in the region.

Greater participation in TDM programs have great potential for pollution exposure reduction by reducing the number of single-occupant vehicles.

Vision Zero – Traffic-related fatalities and serious injuries are a critical and preventable public health and equity issue in the region. Vision Zero is a national campaign to eliminate all traffic-related deaths and serious injuries by focusing on policies and the redesign of streets to create a transportation system that is safe for everyone. In adopting Vision Zero, SANDAG will work towards Zero by collecting and analyzing crash data to identify safety issues and recommend solutions, developing a regional safety policy, continuing to construct the Regional Bike Network, working with local jurisdictions to conduct outreach for and build out their complete streets networks, and funding educational programs, including opportunities to collaborate with tribal nations.

Statistics show that low-income communities and communities of color are disproportionately affected by traffic-related injuries and fatalities, which indicates that establishing an equitable and inclusive transportation system is a critical component of achieving Vision Zero. SANDAG will prioritize consideration of and outreach with marginalized communities to make transportation safe and convenient for every person in the region. Pollution exposure reduction can be achieved when people make greater use of facilities that may currently be perceived as—or actually be—dangerous.

Fix It First – The 2021 Regional Plan envisions many improvements to the San Diego transportation system and network to set the region up for success as a world-class transportation system. To optimize investments in the region's transportation infrastructure, the 2021 Regional Plan and the 5 Big Moves focus on improving upon existing roads, rails, and sidewalks. The Fix It First strategy aims to repair existing roads and create a system for sustained maintenance in the future, creating a safe and efficient transportation network for all users.

The Fix It First strategy can help reduce pollution exposure by maintaining infrastructure that facilitates use of efficient routes and does not neglect facilities that could force users to seek inefficient and longer routes. The Fix It First strategy can prioritize funding in disadvantaged communities and places that have not seen investment to maintain older facilities that are in various states of disrepair.

Special attention will be paid to the location of transportation maintenance investments relative to the location of social equity focus populations to ensure that they benefit from the transportation maintenance system. Along with maintenance project location, the frequency, treatment type, and quality will be monitored to ensure an equitable distribution of benefits.

Transportation System Management and Operations – Transportation System Management and Operations (TSMO) employs a series of intelligent transportation system strategies designed to maximize the capacity and efficiency of the existing and future transportation system. TSMO includes the establishment of institutional and governance actions to help advance and facilitate cross-agency collaboration to ensure that existing and proposed transportation systems are not operated or managed as independent systems but as a multimodal transportation system. These strategies will help SANDAG manage the complete corridor system in a coordinated way across jurisdictions and operators that include capital and technology investments.

As SANDAG prepares for the design and deployment of TSMO, several steps can be undertaken to help address social equity considerations. Initial efforts are generally carried out during the technology planning process to ensure that the designs and identification of technological tools respond to the needs of the entire community (e.g., voice-activated multilingual applications, traveler information kiosks, and mobile apps).

In addition, recognizing that communications infrastructure plays a pivotal role towards the implementation of Next OS, a near-term effort is the completion of a regional communications digital strategy in an effort to address the digital divide. The strategy will set forth a regional roadmap that will focus on identifying communications infrastructure improvements to bring affordable, reliable, and high-speed broadband internet access to underserved and rural populations.

Better trip routing, traffic signal coordination and overall system efficiency can reduce pollution exposure in disadvantaged communities and throughout the region. Incorporating modernized transportation technology in the region's established and new infrastructure will enable equitable benefits now and in the future.

Value Pricing – The 2021 Regional Plan incorporates a variety of pricing strategies as tools to improve mobility by encouraging changes in travel behaviors while generating revenue to address our aging infrastructure and expand travel options. Specifically, the 2021 Regional Plan explores a network of Managed Lanes, a mileage-based road usage charge, a fee on the fares charged for rides provided by Transportation Network Companies, and further subsidization of transit fares. Pricing strategies such as these are in different phases of planning, design, pilot, and deployment in different regions and are also being explored at the state and federal level.

SANDAG will rely on coordination with the other metropolitan planning organizations in California along with the State Department of Transportation to integrate the selection of technology, collection methods, and account management to ensure a consistent experience for travelers. Meanwhile, other elements of pricing strategies, such as the fee structure and distribution of revenue, should be specifically designed for the San Diego's region's unique environment and priorities. Better managing the system can lead to pollution exposure reduction by reducing congestion and generating funds that can benefit other, cleaner travel options.

For all different pricing mechanisms included in the 2021 Regional Plan, SANDAG will develop the fee structure and distribution of revenue strategy to ensure equitable outcomes. The Next OS can provide discounts to low-income, youth, and other vulnerable populations. Meanwhile, revenues can be prioritized to fund improved transportation options for low-income and historically underserved neighborhoods. Additionally, shifting away from the regressive taxes and fees traditionally used to fund transportation can improve equity outcomes.

Programs

SANDAG administers and/or implements several grant programs that could be utilized to reduce pollution exposure in disadvantaged communities in the region. The following list describes the grant programs that could benefit disadvantaged communities. Applying the Regional Social Equity Planning Framework, future updates to eligibility and grant scoring criteria could include metrics designed to identify projects in disadvantaged communities.

1. **Smart Growth Incentive Program** – The *TransNet* Smart Growth Incentive Program (SGIP) supports transportation investments that create more compact, walkable, bikeable, and transit-oriented communities. Funding for this grant program is made available approximately every three years. The next cycle of SGIP funding is anticipated to be announced December 2022.

2. **Active Transportation Grant Program** – The *TransNet* Active Transportation Grant Program (ATGP) provides funding for projects that improve safety and prioritize access for people biking and walking. Funding for this grant program is made available approximately every three years. The next cycle of ATGP funds is anticipated to be announced December 2022.

3. **Specialized Transportation Grant Program** – The SANDAG Specialized Transportation Grant Program (STGP) funds projects and programs that expand mobility options for seniors and individuals with disabilities. The program is composed of two funding sources: *TransNet* and Federal Transit Administration Section 5310. *TransNet* funds are administered through the Senior Mini-Grant Program, which provides financial support to local agencies and nonprofit organizations to offer specialized transportation services for seniors aged 60 and older. Funding for this grant program is made available approximately every two years. The next cycle of STGP funds is anticipated to be announced Summer 2022.

4. **SANDAG Regional Electric Vehicle Charger Program** – SANDAG has committed to funding the Regional Electric Vehicle Charging Program (EVCP) with $30 million over the course of 30 years. In the first three years, SANDAG partnered with the San Diego County Air Pollution Control District (APCD) and the California Energy Commission to launch the EVCP known as the CALeVIP San Diego County Incentive Project—a first-come, first-served rebate program to offset the purchase and installation costs of EV charging stations in San Diego County. The EVCP established a "communities of concern" definition[2] and committed 25% of total program funds to installations in these communities. While the state and APCD funding for the CALeVIP partnership is only for the first three years of the SANDAG EVCP commitment, SANDAG will reassess EVCP program objectives, funding levels, and eligibility to ensure funds are equitably distributed as the CALeVIP San Diego County Incentive Project wraps up.

[2] Communities of concern include SB 535 disadvantaged communities and Assembly Bill 1550 (Gomez, 2016) low-income communities, 2020, calevip.org/faq/what-low-income-community-lic-0; calevip.org/faq/what-disadvantaged-community-dac-5.