Chapter C: Sustainable Communities Strategy

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SUSTAINABLE COMMUNITIES STRATEGY (SCS)

SUMMARY STATEMENT

As required by the Sustainable Communities and Climate Protection Act of 2008 (Senate Bill 375), the 2022 Regional Transportation Plan and Sustainable Communities Strategy (RTP/SCS) contains a SCS that considers both land use and transportation together in a single, integrated planning process that accommodates regional housing needs and projected growth. The 2022 RTP/SCS updates the current RTP/SCS, adopted by TCAG in August, 2018, and incorporates new strategies to address rapidly changing regional, national, and global context. As have past RTPs, the 2022 plan shows how the region can invest limited transportation funds to maintain, operate and improve an integrated, multi-modal transportation system with the purpose of facilitating the efficient movement of people and goods. The updated plan identifies specific strategies, policies, and actions, including a list of programmed and planned transportation projects feasibly within the region's anticipated transportation funding levels, to meet the current and future needs of the region. The planning horizon of the 2022 RTP/SCS is 2046.

The region's Sustainable Communities Strategy recognizes the fundamental relationship between land use and transportation choices: the two components influence each other and neither component can be understood without reference to the other. TCAG has integrated an analysis of population growth, land use, and housing need into the long-range transportation planning process. Thus, the combined Regional Transportation Plan & Sustainable Communities Strategy strives to address transportation planning holistically, understanding transportation patterns in the context of existing and possible future land use and housing configurations. If feasible, the forecasted development pattern for the region, when integrated with the transportation network and policies, must reduce greenhouse gas emissions from passenger vehicles to achieve State-approved targets, as well as the region's own goals. The 2022 RTP/SCS meets the requirements of SB 375 and demonstrates how the integrated land use and transportation plan achieves the region's mandated greenhouse gas emission targets for passenger vehicles.

In updating the SCS, TCAG actively sought input from local decision-makers and communities, interested stakeholder groups, and other government agencies through an extensive public process. TCAG's 2022 RTP/SCS builds on and incorporates careful planning work at both the regional and local level. Past planning efforts by TCAG and member agencies are on track toward regional sustainability and strive to address the region's common planning challenges. Future growth modeled as part of the preferred scenario was developed in close coordination with TCAG member agency planning staff. Likewise, just as transportation projects were developed in close coordination with Caltrans, local public works departments, and transit providers.

The preferred scenario emerging from this development process and selected by the TCAG Governing Board is the "Cross-Valley Corridor Blueprint Plus" scenario. This scenario, while updated and distinct, builds on the strategy and vision of compact and efficient growth and protection of agricultural and open space resources which has been evolving since the adoption of the Tulare County Regional Blueprint in 2009.

Among other things, SB 375 requires the Regional Transportation Plan & Sustainable Communities Strategy to identify areas within the region sufficient to house the entire forecasted population of the region and to meet regional housing need for the eight-year period from 2023 to 2031, as allocated across the region's nine local jurisdictions. Whereas the 2018 plan utilized the same planning assumptions regarding housing needs as the prior adopted (2014) plan, TCAG must update the RTP/SCS every four years, the RHNA planning process occurs every eight years, every other RTP/SCS cycle. The 2022 RTP/SCS incorporates a new Regional Housing Needs Allocation (RHNA) Plan (addressing the state's expanded fair housing planning requirements (AB 686)) and regional growth forecast.

In planning for projected growth in the region, the 2022 RTP/SCS represents a voluntary strategy that retains local government land use autonomy. Neither SB 375 nor any other law requires local member agency general plans or land use regulation to be consistent with the preferred growth scenario. Implementation of the 2022 RTP/SCS is therefore dependent on local government policy decisions and voluntary local government action. The 2022 RTP/SCS is also dependent on the availability of adequate funding. The plan allocates funding considered reasonably available to transportation investments over a long period. It includes only those projects that can be afforded within the real, expected fiscal constraints. Indeed, federal law requires inclusion of projects in the adopted RTP/SCS as a prerequisite to the use of federal funding for these projects.

In compliance with the California Environmental Quality Act (CEQA), a programmatic environmental impact report (EIR) evaluates the environmental effects of the 2022 RTP/SCS. The EIR lays the groundwork for the environmental review of listed transportation projects and allows for the streamlined review of qualifying development projects within Transit Priority Areas as provided by SB 375.

INTRODUCTORY STATEMENT

BACKGROUND

In 2005, Governor Arnold Schwarzenegger created the California Partnership for the San Joaquin Valley. This is a partnership between state agency heads and Central Valley representatives to make recommendations to improve economic vitality and the quality of life of Valley residents.

In creating the Partnership Governor Schwarzenegger stated that the "Valley is home to the richest agricultural region in the world, a pathway for interstate commerce, and one of the fastest growing regions in our state. But this region also faces some tremendous challenges, including high levels of poverty and unemployment, some of the worst air quality in the nation, and limited access to healthcare."

Also in 2005, the eight Regional Transportation Planning Agencies (RTPA) of the San Joaquin Valley (SJV) jointly initiated the SJV Regional Blueprint Planning Process. The goal of the process was to address transportation and land use planning issues of the SJV cooperatively among the eight counties of the region.

AB 32, the California Global Warming Solutions Act, was adopted by the Legislature in 2006. The state agency with overall responsibility for implementation of AB 32 is the California Air Resources Board (CARB). In November 2017, CARB approved the most recent update to its Scoping Plan to implement AB 32 (California, with CARB managing the effort, is developing an updated scoping plan with a target date for adoption in of 2022.). The Scoping Plan

describes a strategy for the State to meet its AB 32 goal of reducing GHG emissions by 40 percent from 1990 levels by 2030 and substantially advance toward the goal of reducing GHG emissions by 80 percent from 1990 levels by 2050. Most of the GHG reductions from the transportation sector in the Scoping Plan come from deployment of new vehicle technologies and low carbon fuels. However, reduction in the growth of vehicle miles traveled (VMT) is also identified as an important component. The SB 375 per capita GHG reduction targets for SCSs set by CARB are considered an important benchmark for progress in reducing GHG from travel activity. In setting the per capita GHG reduction targets from auto and light truck emissions by 2020 (13% for TCAG) and 2035 (16% for TCAG) from 2005 levels, CARB balances the reduction contribution needed from this component of the Scoping Plan with the ability of the regions to reasonably demonstrate reductions through their SCSs, which are an integral part of fiscally constrained Regional Transportation Plans.

In 2007, the member agencies of TCAG initiated the process of the Tulare County Regional Blueprint. This was motivated, in part, by the recognition that it would ultimately be up to the County and the cities to give the broad principles of the SJV Blueprint form and reality at the local level. The Tulare County Regional Blueprint process, supported by TCAG, was a vehicle of collaboration and public outreach to develop this local vision. This process included consultation with partner agencies at the regional (such as the SJV Air District), state, and federal level. The original Tulare County Regional Blueprint concept was adopted by the TCAG Governing Board in May of 2009. (See Appendix 1-L) This early planning effort demonstrates the existing, locally based impetus for addressing transportation and land use planning issues at the regional scale.

GOALS AND BENEFITS

The explicit goal of the SCS, as set forth in SB 375, is to develop a vision for future growth in the Tulare County region that will reduce per capita greenhouse gas (GHG) emissions from automobiles and light trucks. However, the strategies that would implement this vision would also be part of the broader effort of the region to work together to address its many other issues and goals. These include healthier and more livable places and communities, lower costs for taxpayers and households, improved access and mobility and more vital and responsive markets for housing and jobs.

While it meets the requirements of SB 375, the 2022 RTP/SCS builds on past efforts to move the region forward toward achievement of a broader range of goals related to the environment, mobility, social equity, health and safety, and economic vitality. The plan was shaped using a performance-based approach as required by federal transportation law that measures progress toward these plan goals. From the range of integrated land use and transportation planning options studied, the 2022 RTP/SCS designates a preferred future land use and transportation scenario that, applying quantifiable performance measures, best achieves the plan goals and meets the region's transportation needs. The land use/transportation scenario designated by the TCAG Governing Board, taking into consideration the RTP/SCS planning and outreach process, is the Cross Valley Corridor Blueprint Plus Scenario. Its characteristics and background are described later in this chapter.

EMERGING RISKS AND PROSPECTS

Tulare County residents, the cities, and county, are facing several challenges due to largescale extra-regional trends and effects that are economic, technological, and climate-related in nature. In August 2021, the RTP Roundtable membership was polled as to how they would prioritize these challenges. The challenges discussed are listed below in roughly the order that they were identified as "high" priority:

- Sustained and extreme hot weather
- More frequent and intense wildfires
- Shifting precipitation rates and patterns
- Deployment rate of improved broadband infrastructure to support teleworking
- Deployment rate of electrification infrastructure to support electric vehicles
- E-commerce and changing consumer patterns with possibly fewer short trips but more delivery trips
- Deployment rate of self-driving vehicle technology
- Unknowns as to how the technological trends will influence travel behavior
- Economic recovery/increased employment accelerating growth in car & truck vehicle miles traveled (VMT)
- Deployment rate of micro-mobility technology (combing options from different providers into a single mobile service; mobility as a service)
- Increase in the "gig economy" (short-term or freelance work)
- Decrease in fuel prices increasing VMT as it becomes less expensive to drive

This list of challenges is the result of one survey and is not exhaustive. Funding opportunities to address some of these challenges have become available from the state in the last few years, such as Senate Bill 1 gas tax revenues, Regional Early Action Planning (REAP), and cap-and-trade monies and associated grant programs (such as the Affordable Housing and Sustainable Communities Program and Low Carbon Transit Operations Program).

In response to the RTP Roundtable survey on emerging risks and prospects, TCAG has distilled these questions into eight Futures Planning topics that have potential to stress the resiliency of the Tulare County economy and by extension our ability to implement the 2022 RTP/SCS. Although Futures Planning is not an exact science it can be useful to anticipate economic and environmental impacts and plan to mitigate possible negative effects of risk through policy changes that improve the region's resiliency. TCAG has procured a robust economic model, REMI that is able to test some of the external economic and environmental factors that may impact Tulare County.

- 1. Water Availability
 - a. Decreased Tourism Spending due to more fires/droughts
 - b. Decrease output from less agriculture/business activity due to fire/droughts
 - c. Decrease amenity of the region due to these conditions which might induce people to move to a different region
- 2. US Carbon Tax
 - a. Increased production costs for businesses due to carbon tax.
 - b. Increase is consumer prices as increased production costs are passed along to consumers.
 - c. Increased energy and fuel prices for businesses and residential consumers

- 3. US Productivity
 - a. Increased productivity generally leads to an increase in GDP.
 - b. Increased productivity due to automation may lead to an increase in unemployment
 - c. Specific industries may be impacted more than others
- 4. Housing Preference
 - a. As population shifts toward urbanization what are the effects on housing options
 - b. How urbanization impacts builder's housing investment and impacts on housing and land supply and real estate prices
- 5. Telecommute Share
 - a. Change in consumer consumption patterns less on fuel and food and beverage sectors more on energy and groceries
 - b. Less highway congestion during peak periods
 - c. Increased amenity as air quality improves.
- 6. Electric Vehicle Market Share
 - a. Increased consumer spending on electricity
 - b. Increases public investment and output in construction for EV Infrastructure
 - c. Increased amenity as air quality improves
- 7. Auto Operating Cost
 - a. Increased cost for fuels and maintenance
 - b. Reduction in vehicle miles traveled (VMT)
- 8. Federal Transportation Funding
 - a. Increase in output for construction activities
 - b. Increased employment in construction sector
 - c. Improved transit systems
 - d. Decrease in travel times

TABLE SCS-1.1 REMI ECONOMIC FUTURES MODELING ASSUMPTIONS



While REMI should not be used to test the impact of many of these futures subjects directly, TCAG made assumptions (Table SCS-1.1) about possible impacts to the Tulare County economy in order to test the region's resiliency to these external macroeconomic pressures both positive and negative. TCAG admits this futures analysis can be considered highly speculative in nature, but care was given to include trending topics of concern to our region, state, and beyond.

One alternative future was tested against the base economic output from the REMI PI+ model. This test can help to inform how resilient the region's economy is overall but also gives some clues as to necessary conditions for that resiliency. And by extension we can make implications as to the ability TCAG to implement the strategies and projects envisioned in the 2022 RTP/SCS from a revenue standpoint.

TABLE SCS-1.2 REMI PI+ RESULTS

		2046 Base	2046 Futures	Delta %
Total Employment	Thousands (Jobs)	238.857	246.054	3.01%
Private Non-Farm Employment	Thousands (Jobs)	186.952	195.664	4.66%
Residence Adjusted Employment	Thousands	252.738	255.479	1.08%
Population	Thousands	554.105	551.561	-0.46%
Labor Force	Thousands	255.793	254.336	-0.57%
Gross Domestic Product	Billions of Fixed (2012) Dollars	28.817	29.244	1.48%
Output	Billions of Fixed (2012) Dollars	57.98	58.981	1.73%
Value-Added	Billions of Fixed (2012) Dollars	28.817	29.244	1.48%
Personal Income	Billions of Current Dollars	54.256	54.014	-0.45%
Disposable Personal Income	Billions of Current Dollars	47.287	47.078	-0.44%
Real Disposable Personal Income	Billions of Fixed (2012) Dollars	24.527	23.224	-5.31%
Real Disposable Personal Income per Capita	Thousands of Fixed (2012) Dollars	44.264	42.107	-4.87%
PCE-Price Index	2012=100 (Nation)	192.797	202.71	5.14%

Overall, the futures test showed that the region's economy is quite resilient with respect to GDP and Employment but that increasing consumer prices had a negative effect on Disposable Income (Table SCS-1.2). However, this is to be expected as the state transitions to an electric economy and clean energy production. Although, this resiliency is entirely dependent upon the increasing productivity promised by the coming automation age. Indeed, this test indicates that the state's goals in its California Transportation Plan (CTP) 2050 of Economy, Environment, and Equity can be achieved over the coming decades.

The Covid-19 Pandemic recently brought a chance to test the resiliency of the region's economy in real time. The agriculture-based economy proved to be "essential" and consequently the region's economy did well despite the challenges. Similarly federal and state policies with respect to economic aid packages and unemployment insurance helped to mitigate the resultant shock to the system.

Ultimately the story of California's economy has historically been a resounding success and from a certain point of view Tulare County is also tied to that success. Negative externalities likewise will be alleviated through state and federal emergency intervention as in the case of pandemics and natural disasters.

Futures planning and resiliency testing are ongoing activities that will feature more prominently in other TCAG studies and will no doubt be explored in greater detail in successive Sustainable Communities Strategies.

CREATING THE SCS

PLANNING FOR HEALTHY, EQUITABLE, AND SUSTAINABLE GROWTH

Development of the Sustainable Communities Strategy (SCS) involved the study of three separate land use and transportation scenarios (Trend, Blueprint Plus, and Cross-Valley Corridor (CVC) Blueprint Plus). Each analyzes different combinations of land use and transportation variables. Modeling data was also developed for the existing plan (Blueprint) updated to the current socio-economic forecasts and a scenario that contains no new transportation investments through TCAG beyond what is already programmed (No Project). The preferred scenario was selected from these scenario options based on scenario performance as quantified by the adopted performance measures tied to the overall 2022 RTP/SCS goals. All scenarios applied the same region-wide population, employment, and housing projections. Sub-regional distribution of forecast population growth varies by scenario consistent with allowable land uses, residential land use capacity and policy assumptions.

Central to the SCS is a set of land use assumptions identifying the general location of uses, residential densities, and building intensities within the region. (See Government Code Section 65080(b)(2)(B)(i)). While there is no requirement of consistency between the 2022 RTP/SCS and local land use plans, and while local jurisdictions explicitly retain land use authority under SB 375, the 2022 RTP/SCS is required to make land use assumptions and allocate forecast future growth consistent with those assumptions and the allocation of regional housing needs. Starting with land uses allowed by existing, adopted local General Plans, the land use assumptions, developed in close coordination with the planning staff of TCAG's member jurisdictions, selectively provide, in certain scenarios, for intensification of residential and commercial land uses in urban areas proximate to existing transit. The intent of these changes is ultimately to shorten trip distances and reduce vehicle miles traveled by (1) directly addressing regional jobs/housing imbalance by providing more housing near areas of job growth, and (2) promoting more trips, both local and inter-city, by alternative transportation modes, especially public transit, walking and biking.

Allowable land uses in the preferred scenario are adequate to accommodate forecast population, household, and employment growth and to meet identified housing need. For the preferred scenario, forecast population growth is distributed consistent with this pattern of allowable land uses. The development needed to satisfy future growth is focused within existing urbanized areas and minimizes impacts to resource areas identified in the San Joaquin Valley Greenprint.

The transportation considerations of the SCS include all new programmed and planned projects, including modified and enhanced transit service. Additionally, continuing the approach of the 2018 plan, the SCS includes an enhanced transit strategy that creates a framework for future transit service expansion at such time as new revenue sources may become available. The enhanced transit strategy is described in greater detail in the Regional Long Range Transit Plan (Appendix 1-D). Recognizing the uncertain nature of future, new revenue sources, it takes a targeted, balanced, and flexible approach to expanding transit service as needed in the future. Specifically, the enhanced transit strategy included in the preferred scenario commits to transit service expansion as new revenue sources become available (1) when and where transit enhancements are needed (defining quantitative triggers to determine when such need exists), and (2) while protecting existing funding for competing

local demands, such as street and road maintenance. Because it is a general strategy, it does not change the list of fiscally constrained, programmed, and planned transportation projects.

The strategies contained in the SCS for addressing the challenges of the Tulare County region are not completely new. The work started by TCAG member agencies since before 2005 has been the foundation for these ideas, and in subsequent RTP/SCSs, TCAG has built on this foundation by coordinating with its local and regional partners on data collection and strategy development and soliciting input from the public. One example of this is the Regional Active Transportation Plan, updated in 2021, (Appendix 1-C) which developed a region-wide needs analysis and project prioritization for active transportation projects.

The SCS can be thought of as including an enhanced land use forecast which addresses two major objectives of SB 375. These objectives are (1) to meet the greenhouse gas reduction targets for automobile and light truck emissions that the Air Resources Board has set for the region and (2) to promote better coordination of land use, transportation, and housing planning at the local and regional level.

Specifically, the SCS is required to:

- Identify the general location of uses, residential densities, and building intensities within the region
- Identify areas within the region sufficient to house all the population, including all economic segments of the population, over the course of the planning period of the regional transportation plan
- Identify areas within the region sufficient to house an eight-year projection of the regional housing need for the region identified in the Regional Housing Needs Assessment (RHNA)
- Identify a transportation network to service the transportation needs of the region
- Gather and consider best practically available information on resource areas and farmland in the region
- Set forth a forecasted development pattern for the region, which, when integrated with the transportation network, policies, and measures, will reduce GHG emissions from automobiles and light trucks to achieve the GHG emissions reductions target approved by CARB
- Provide consistency between the development pattern and the RHNA allocation
- Allow the RTP to achieve air quality conformity under Section 176 of the Clean Air Act

The SCS does not regulate the use of land. It does not supersede the land use authority of cities and counties. Local agency land use plans and ordinances, including general plans, are not required to be consistent with the RTP/SCS. Govt. Code Section 65080(b)(2)(K).

Consequently, the realization of the benefits of the SCS depends upon the continued coordinated and cooperative action of the TCAG member agencies in land use decisions consistent with the SCS. It also depends on economic and social factors on a larger scale that local governments may influence but cannot control.

PUBLIC DIALOG

Public outreach for the 2022 RTP/SCS update has been directed to giving the entire community a voice in shaping the new SCS with emphasis on under-served communities and vulnerable populations. Public meetings of the stakeholder advisory committee, the RTP Roundtable, have provided an opportunity for public input throughout the process. In addition to events at disadvantaged communities throughout the region, Presentations and opportunities for input were done at the Tulare County Fair, city council meetings and TCAG Board meetings. Considering ongoing restrictions due to the COVID-19 pandemic, webbased and social media channels were upgraded and publicized as an important means for providing information on, and collecting input for, the SCS development process. Public dialog in development of the SCS is further described in Appendix 1-I.

EXISTING LAND USE

Existing land uses and resource areas were integrated into the RTP/SCS in various forms compiled in geographic data that acted as constraining factors on future growth during SCS scenario development. The SCS preferred scenario focuses new development in existing urbanized infill locations avoiding resource areas identified in the San Joaquin Valley Greenprint Project (see Appendix 1-M). The RTP/SCS accounts for existing land uses including the significant proportion of the county's land area that is in federally owned or in agricultural uses (Table SCS-1.3). The RTP/SCS accounts for the land uses of the eight incorporated cities, the many thriving communities in the unincorporated areas, and the diverse rural regions (Figure SCS-1.1). Most of the State, Federal and Tribal lands make up the eastern half of the county, as depicted in Figure SCS-2.1.

Land Use- Tulare County, 2021	Acres	Percentage
Agriculture	1,364,838	44.1%
Commercial	10,444	0.3%
Industrial	9,577	0.3%
State, Federal & Tribal Lands	1,523,345	49.2%
Other Urban Uses	3,843	0.1%
Large Lot and Rural Res.	70,198	2.3%
Residential	38,571	1.2%
Valley & Foothill Public Lands	76,675	2.5%
Total	3,097,492	

TABLE SCS-1.3 LAND USE TULARE COUNTY, 2021

FIGURE SCS-1.1 2021 TULARE COUNTY LAND USE



FARMLAND

The Department of Conservation's Farmland Mapping and Monitoring Program (FMMP) provides a comprehensive survey of important farmlands for the region. The latest year for which the survey is available is 2018; and this data was the best practically available data at the time of SCS preparation.

Important Farmland categories are defined as follows:

- Prime Farmland: Farmland with the best combination of physical and chemical features able to sustain long term agricultural production. This land has the soil quality, growing season, and moisture supply needed to produce sustained high yields.
- Farmland of Statewide Importance: Farmland like Prime Farmland but with minor shortcomings, such as greater slopes or less ability to store soil moisture.
- Unique Farmland: Farmland of lesser quality soils used to produce the state's leading agricultural crops. This land is usually irrigated but may include non-irrigated orchards or vineyards as found in some climatic zones in California.

RESOURCE AREAS

Development of the RTP/SCS involved compilation and consideration of information regarding open space, habitat, farmland, and other resource areas. Resource maps produced in March 2013 as part of the SJV Greenprint provide up to date location information on critical habitats, vernal pools, and other resources on the regional scale. These resource areas were compiled as GIS layers that acted as constraints to development of land in the SCS preferred scenario. This data and was the best practically available data on these resource areas at the time of SCS preparation.

OPEN SPACE

The open space and conservation areas considered in SCS development comprise the Protected Areas Database developed by the U.S. Geological Service (PAD-US)¹ and include lands held in ownership for permanent or long-term open space use. These include national parks and forests, public lands, State and local parks and reserves, lands held by non-profit organizations, conservation easements and many other areas. The Protected Areas Database was developed with aggregated datasets from the Bureau of Land Management, the GreenInfo Network and The Nature Conservancy. Other federal, state, local, non-governmental organizations and land trusts provided data that was more limited in scope. These open space and conservation areas were compiled as GIS layers that acted as constraints to development of land in the SCS preferred scenario

¹ https://gapanalysis.usgs.gov/padus, accessed on 11/10/2021

FIGURE SCS-2.1 TULARE COUNTY OPEN SPACE AND CONSERVATION AREAS



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Existing FMMP areas and SJV Greenprint resource areas are indicated below (Figure SCS-3.1) in terms of important farmland and critical habitat acres with 700,181 existing acres of important farmland, 291,000 acres of existing critical habitat, and 29,929 acres of present undisturbed vernal pools.



FIGURE SCS-3.1 EXISTING SJV GREENPRINT RESOURCE AREAS

Important farmland under SB375 is considered prime farmland, unique farmland, and farmland of statewide importance. Critical habitat and vernal pool data was obtained from the San Joaquin Valley Greenprint, a regional resource that can inform land use decisions and project planning efforts, providing context for stakeholders and decision makers when making land use planning decisions (Appendix 1-M). The SJV Greenprint collects and presents information about the Valley's resources through existing maps, resources, policies, and regulations, such as USFWS (US Fish and Wildlife Services), General Plans, Water Management Plans, Agricultural Preservation Programs, and develops new data sources where needed. Maps cover Agricultural, Biodiversity, Water, and Energy and include over 100 maps available in the SJV Greenprint Mapping and Data Portal².

The species considered in the Greenprint analysis include the following that are not necessarily located in Tulare County: CA Condor, CA Gnatcatcher, Least Bells Vireo, SW Willow Flycatcher, Western Snowy Plover, Little Kern Golden Trou, Delta Smelt, Chinook (CVSR), Steelhead (CCV) Steelhead (SC), Steelhead (SCCC), Steelhead (CCC), Alameda Whipsnake, Arroyo Toad, CA Red-Legged Frog, CA Tiger Salamander, Desert Tortoise, Desert Tortoise Mojave, Mountain Yellow-Legged Frog, Vernal Pool Fair Shrimp, Vernal Pool Tadpole Shrimp, Buena Vista Lake Shrew, Fresno Kangaroo Rat, San Bernardino Kangaroo Rat, Sierra Nevada Bighorn Sheep, Colusa Grass, Contra Costa Goldfields, Fleshy Owls Clover, Greene's Tuctoria, Hairy Orcutt Grass, Hoover's Spurge, Keck's Checkermallow, Large Flowered Fiddleneck, Monterey Spineflower, San Joaquin Orcutt Grass, and Yadon's Piperia.

GROWTH FORECAST

A vital input to the SCS development process was an updated forecast of population, housing, and jobs. TCAG developed a new forecast for the 2022 RTP/SCS based on the

² http://sjvmaps.ice.ucdavis.edu

most comprehensive and up-to-date regional forecasts and projections available. The growth forecast for this RTP/SCS incorporates substantial data available from projections published by the California Department of Finance, Demographic Research Office (DOF) in 2021. The growth forecast, based on the DOF projection, is much more restrained than in previous RTPs. The new growth forecast is summarized in Table SCS-2.1 below:

Year	Population	Housing Units	Jobs
2021	481,649	154,436	187,137
2025	500,134	163,135	192,262
2030	520,428	172,550	199,678
2035	535,463	181,012	206,681
2040	551,563	187,952	212,582
2046	567,383	195,210	218,846

TABLE SCS-2.1 DEMOGRAPHIC FORECAST

The new 2021 DOF population projection for the year 2040 (551,563) is quite a bit lower than that of the 2017 DOF projection for the year 2040 (594,348) used for the 2018 RTP/SCS and significantly lower than the projection for the year 2040 (722,838) used for the 2014 RTP/SCS, a difference of 171,275 persons. This is due to lower birthrates consistent with the state as a whole and the fact that Tulare County is still experiencing low net migration, (573 persons in 2019) as opposed to the peak (+4,473 persons in 2004), because of the Great Recession. Figure SCS-4.1 shows a comparison of recent population projections for the Tulare County Region.

It is important to note that a significantly lower population projection for the year 2040 may make it more difficult to achieve GHG reduction targets and harder to implement higher density and mass transportation solutions. Notwithstanding, the 2022 RTP/SCS represents an enhanced effort in GHG per capita reductions as compared to the previous RTP/SCSs, considering updated demographics assumptions. The 2022 RTP/SCS includes higher density with an emphasis on transit-oriented development near Cross-Valley Corridor stations and implementation of the Phase I express bus service all the corridor providing a commute alternative for SR 99, SR 198, SR 65, and SR 63.

FIGURE SCS-4.2 DOF STATE AND COUNTY POPULATION PROJECTIONS

DOF State and O	County Popu	ulation Pro	jections l	P-1							
Total Population Project	tions for California	a and Counties:	2010 to 2060 i	n 5-year Increi	ments						
	Estimates					Proie	ections				
	2010	2015	2020	2025	2030	2035	2040	2045	2050	2055	2060
California	37,366,938	39,007,121	39,782,419	40,808,001	41,860,549	42,718,403	43,353,414	43,785,947	44,049,015	44,176,739	44,228,057
Tulare	442,517	463,671	480,788	496,657	516,810	535,463	551,563	565,075	575,525	584,163	591,539
Projections Prepared by Der	mographic Research	Unit, California De	epartment of Fin	ance, March 202	1 - TCAG 2022 F	RTP/SCS					
						0005		00.45	2052	0055	
Tulara	2010	2015	/188 293	2025	2030	2035	2040	617 916	639 /177	2055	2060
Projections Prepared by Der	moaraphic Research	Unit. California De	epartment of Fin	ance. February 2	017 - TCAG 201	8 RTP/SCS	554,540	017,510	035,477	033,482	075,107
· · · · · · · · · · · · · · · · · · ·						,					
	2010	2015	2020	2025	2030	2035	2040	2045	2050	2055	2060
Tulare	443,487	467,170	498,559	537,015	578,858	616,547	650,819	683,533	715,722	747,912	779,772
Projections Prepared by Der	mographic Research	Unit, California De	epartment of Fin	ance, December .	2014						
	2010	2015	2020	2025	2030	2035	2040	2045	2050	2055	2060
Tulare	442,179	479,763	520,542	564,787	612,792	664,878	721,391				
TCAG 2014 RTP/SCS				· •			· •				
	2010	2015	2020	2025	2030	2035	2040	2045	2050	2055	2060
Tulare	443,066	473,785	526,718	575,294	630,303	682,022	722,838	755,809	784,334	811,412	836,850
Projections Prepared by Der	mographic Research	Unit, California De	epartment of Fin	ance, January 20)13						
			Tulare Co	ounty DO	F Popula	ition Proj	ections				
	900,000										
	800.000										
	800,000							-			
								-			
	700,000										
								-			
	600,000										
								-			
									DOF 2013		
	500,000	_							501 2015		
									DOF 2014		
	400,000								DOF 2017		
									DOF 2021		
	200.000										
	300,000										
	200,000										
	100.000										
	100,000										
	o +	2010 2015	2020	2025	2020 202	5 2040	2045	2050			
		2010 2015	2020	2025	2030 203	5 2040	2045	2050			

LAND USE SCENARIOS

Development of the SCS involved the study of distinct land use scenarios, each analyzing different combinations of land use and transportation variables. The preferred scenario was selected from these scenario options based on stakeholder input and scenario performance measures tied to the overall RTP/SCS goals. (See Appendix 1-I and 2-R). All scenarios applied the same region-wide population, employment, and housing projections. Transportation and air quality emissions methodologies for scenario comparisons are described in the SCS Technical Methodology Paper (Appendix 2-R). Sub-regional allocation of forecast population growth varies by scenario consistent with allowable land uses, residential land use capacity and policy assumptions as follows:

TREND

The Trend Scenario shows a projected development pattern that is generally consistent with the development pattern seen in 2014. It depicts future growth continuing without reference to any of the Regional Blueprint principles or strategies, like more compact development. This scenario can be considered a "status quo" strategy and provides a baseline for the Blueprint-based scenarios.

BLUEPRINT (OLD PLAN)

The Blueprint scenario was adopted as the preferred scenario of the 2018 RTP/SCS. It is based on the application of the development principles adopted as part of the 2009 Tulare County Regional Blueprint (Appendix 1-L). Primary among these principles is an objective of a 25% higher overall density of new development compared to the Trend Scenario. In general, this means a development footprint similar to the baseline but smaller in extent. It can also be thought of as taking more years to reach the same extent because of a greater proportion of smaller-lot single-family and multi-family construction and reflected as well in compactness of commercial and industrial development. The scenario also represents an increased and complementary investment in transit and active transportation, taking advantage of greater density along service corridors.

BLUEPRINT PLUS

The Blueprint Plus scenario was created to explore the ramifications of a change in future development patterns more pronounced than that envisioned by the Regional Blueprint. Blueprint Plus has an objective of overall density of new development 5% higher than Blueprint. This is reflected in an incremental shift to more compact development types primarily within the cities' spheres of influence where there is infrastructure to support such development, or such services can be efficiently extended. Blueprint Plus also includes a proportional increased emphasis on transit and active transportation modes as well as an emphasis on fix-it first for streets and highways and a de-emphasis of capacity increasing highway projects as a way of addressing travel demand for new development. Projects that can increase capacity for light vehicle travel may still be part of this scenario when needed to address inter-regional travel, goods movement, and safety. Blueprint Plus was updated for base conditions in both the 2018 and the current RTP/SCS updates.

CROSS VALLEY CORRIDOR (CVC) BLUEPRINT PLUS

The Cross-Valley Corridor Blueprint Plus Scenario has an objective of overall density of new development 5% higher than Blueprint, like Blueprint Plus. These densities are applied to a

future transit-oriented development pattern anticipating increased importance of the Cross-Valley Corridor (CVC, 75 miles spanning 3 counties and linking the metro areas of Hanford/Lemoore - Visalia MSA - Porterville) including a major expansion of TransPort (a pioneering public micro-transit service that uses the Uber app interface) throughout the region and maximizing other transit, bike, and pedestrian links to provide access from all parts of the county to urban centers along the corridor. The scenario incorporates even greater alternative mode investments that benefit the region's disadvantaged communities such as express passenger service/bus rapid transit (BRT) on State Routes 63, 65, and 198, Avenue 280, and other regional routes serving the CVC. This scenario is described in greater detail as the preferred scenario in the next section.

PREFERRED SCENARIO: CROSS VALLEY CORRIDOR (CVC) BLUEPRINT PLUS

FUTURE LAND USE

At the foundation of the SCS is a land use pattern identifying the general location of uses, residential densities, and building intensities within the region (Figure SCS-5.1, Table SCS-4.1). The general distribution of land uses, that is, residential, commercial, industrial, etc., is based on the existing, adopted general plans of Tulare County and the eight cities. The horizon year of the RTP/SCS, 2046, is beyond the horizon year of all the currently adopted general plans. The current general plans have horizon years of 2030 or sooner. The principles of the preferred (CVC Blueprint Plus) scenario guided the allocation of future development sufficient to accommodate the forecasted growth in population, households, and employment through 2046. (See Table SCS-3.1) Most notable of these principles is an increase in average densities county-wide by generally 30% over the status guo densities. This is articulated in a growth pattern that is reflective of the CVC's potential for increasing multi-modal travel and transit-oriented development. (Figure SCS-4.1) The CVC Blueprint Plus scenario, as a vision of regional growth, will continue to evolve. Its current form is based on the 2018 Cross Valley Corridor Plan. (Appendix 1-E) which was part of the discussion for the 2018 RTP/SCS. In 2016, TCAG initiated the Cross Valley Corridor Plan to study connectivity and mobility improvements in the Central San Joaquin Valley. The project aims to increase transit service efficiency, enable communities and cities in the Cross Valley Corridor (CVC) to promote developments that support transit usage, encourage revitalization and economic development, and facilitate growth in support of the California High-Speed Rail (HSR) investment. This study enabled TCAG to evaluate a range of new public transit service alternatives that would be able to accommodate future population and economic growth, while being compatible with existing land uses and future development opportunities. By planning for a CVC transit system well in advance, right-of-way and land needs can be identified and protected now, avoiding costly acquisitions or eminent domain processes later. TCAG has initiated the next planning step, a Transit Development Plan for the CVC. When completed, probably within the next RTP/SCS update cycle, it will inform the character and timing of the next phase of fiscally constrained project planning for development of the CVC.

Forecast 2046			
Jurisdiction	Population	Housing Units	Employment
Dinuba	30,728	8,826	13,233
Exeter	13,039	4,736	5,977
Farmersville	13,475	3,634	6,260
Lindsay	15,549	4,565	6,688
Porterville	70,518	23,503	32,158
Tulare	80,187	27,468	37,423
Visalia	163,898	62,349	83,242
Woodlake	9,188	2,866	4,269
Unincorporated Tulare County	170,801	57,259	29,596
Tulare County (Total)	567,383	195,210	218,846

TABLE SCS-3.1 FORECASTED POPULATION, HOUSEHOLD, EMPLOYMENT GROWTH

The theme of the preferred scenario continues to be that moderately higher density, applied thoughtfully as an element of urban design and development, will improve regional jobshousing fit. This, in turn, will leverage the ability of local agencies to implement projects that achieve better air quality and improved mobility options.

As stated earlier, the CVC Blueprint Plus scenario, which becomes the SCS for the 2022 RTP/SCS by virtue of selection as the preferred scenario, meets the greenhouse gas reduction targets for the region under SB 375. In March 2018, the California Air Resources Board (ARB) adopted updated greenhouse gas emissions reduction targets for the Tulare County region of 13% by 2020 and 16% by 2035. These targets are defined as per capita reductions to GHG emissions for automobiles and light trucks relative to 2005 levels. The emissions reductions resulting from implementation of the SCS were calculated based on regional travel demand modeling results and vehicle emissions forecasts as described in TCAG's draft Technical Methodology (Appendix 2-R). GHG reduction calculations included other important facets developed in coordination with the ARB, including COVID-19 impacts on planning assumptions for 2020 emissions results and incorporation of off-model strategies into 2035 emissions results.

In combination, these methodologies produced emissions <u>reduction</u> estimates for the preferred (CVC Blueprint Plus) scenario of 13.7% in 2020 and 16.2% in 2035. Under SB 375, GHG reductions are defined in terms of per capita auto and light truck emissions in order to isolate that portion of the overall regional GHG reductions attributable to the interaction of new land development and transportation projects. Growth patterns and transportation projects for the scenarios considered in the RTP/SCS were coded into the TCAG regional travel demand model producing the range of emissions reduction forecasts shown in Table SCS-6.1.

TABLE SCS-4.1 TULARE COUNTY LAND USE 2046

Land Use- Tulare County, 2046	Acres	Percentage
Agriculture	1,358,804	43.9%
Commercial	10,773	0.3%
Industrial	9,801	0.3%
State, Federal & Tribal Lands	1,523,177	49.2%
Other Urban Uses	3,771	0.1%
Large Lot and Rural Res.	70,657	2.3%
Residential	44,012	1.4%
Valley & Foothill Public Lands	76,498	2.5%
Total	3,097,493	

FIGURE SCS-4.2 CROSS VALLEY CORRIDOR PLAN, 2018, P. 62



FIGURE SCS-5.1 TULARE COUNTY LAND USE 2046



A comparison of FMMP Important Farmland and SJV Greenprint resource areas consumed for each SCS land use scenario is indicated below in (Figure SCS-6.1) for Important Farmland and (Figure SCS-7.1) for Critical Habitat areas. No existing areas of present undisturbed vernal pools were harmed because of developing this SCS.



FIGURE SCS-6.1 IMPORTANT FARMLAND CONSUMED

FIGURE SCS-7.1 CRITICAL HABITAT CONSUMED



HOUSING NEED

In the modeling of the 2022 RTP/SCS, sufficient land use capacity was allocated to accommodate all growth in population, household and employment that has been forecast for the county. The CVC Blueprint Plus growth scenario for 2046 was converted to traffic model input data and factored in accordance with the control totals summarized in Table SCS-5 to create model input data for other scenario years as needed for SB 375 and air quality analysis. The SCS (CVC Blueprint Plus Scenario) identifies areas within the region sufficient to house all the population, including all economic segments of the population, through 2046.

SB 375 requires the SCS to "identify areas within the region sufficient to house an eight-year projection of the regional housing need for the region". The regional housing need projection is determined by the California Department of Housing and Community Development (HCD). Coordinating the requirements of SB 375 also means that the currently applicable projection period for the San Joaquin Valley counties has been adjusted to eight years and six months. The RTP/SCS therefore addresses this projection period.

The SCS preferred scenario meets this requirement and supplies enough residential housing capacity by jurisdiction to meet the 8.5-year housing need of 33,214 units projected for the 1/1/2023 to 6/30/2031 period for the TCAG region by HCD. Available housing capacity in each TCAG member jurisdiction in the SCS preferred scenario is adequate to accommodate each jurisdiction's respective share of housing need as allocated by TCAG's adopted RHNA methodology. Available residential capacity in each jurisdiction is thus sufficient to accommodate at minimum that jurisdiction's share of the regional housing need and TCAG's RHNA allocation plan allocates housing units within the region consistent with the development pattern of the SCS.

Table SCS-5 shows the correspondence between modeled land use capacity for the preferred scenario and identified housing need by jurisdiction, including very low- and low-income categories. The traffic model inputs, being based on the preferred scenario, show a greater proportion of "multi-family" development which encompasses 52% of all residential development out to 2046. This represents a range of building types with an average density of 14 units per acre. Because the SCS is consistent with the allocation of housing units under the RHNA plan, the SCS also meets the State housing goals articulated in State housing law. It is TCAG policy to encourage local agencies to further fair housing by implementing the RHNA and SCS goals with respect to housing, land use, and transportation options that increase accessibility to jobs, schools, medical care, and amenities within the region.

TABLE SCS-5.1 RHNA HOUSING NEED VS. LAND USE CAPACITY: PREFERRED SCENARIO

	Land Use	and Use Capacity RHNA Housing Need Land Use Capacity RHNA Housing Need			oacity minus sing Need	
Jurisdiction	Low + Very Low	Total	Low + Very Low	Total	Low + Very Low	Total
Dinuba	630	1,804	625	1,588	5	216
Exeter	733	959	318	844	415	115
Farmersville	343	743	218	654	125	89
Lindsay	426	896	151	789	275	107
Porterville	3,175	4,617	1,409	4,064	1,766	553
Tulare	3,143	5,395	2,319	4,749	824	646
Visalia	7,432	12,259	6,047	10,791	1,385	1,468
Woodlake	247	599	122	492	125	107
Unincorporated	3,493	10,503	2,526	9,243	967	1,260
County Total	19,621	37,733	13,735	33,214	5,886	4,519

TRANSPORTATION NETWORK STRATEGIES

The SCS is required to "identify a transportation network to service the transportation needs of the region." Consistent with federal transportation planning law, the preferred scenario models the regional transportation network, including all the fiscally constrained programmed and planned projects listed and addressed in detail in the Action Element (Chapter D). As described in the Action Element, the 2022 RTP/SCS takes a performance-based approach to modeling and understanding diverse types of transportation investments. The transportation system and investments in the 2022 RTP/SCS include:

- Maintenance and rehabilitation of existing and future facilities
- Continued support of the Regional Vanpool program
- Operation and strategic expansion of public transit including
 - o Bus Rapid Transit Corridor determination & funding for ROW preservation
 - Micro-transit service zones covering all parts of the region to facilitate trips and provide access to the CVC and other transit trunk lines
 - Expansion of Community College Transit Program
 - o Continued transit expansion of over \$1.7 million a year with Measure R
- Strategic road and highway expansion and operational improvements that focus on alleviating major bottlenecks and congestion points
 - Includes requirements to prepare Corridor plans to prioritize and rank projects within key congestion related corridors
- Bicycle and pedestrian retrofits and new facilities
 - o Includes implementation of Visalia Waterways and Trails Plan

- Investment of over \$70 million for bicycle/pedestrian projects over twenty years
- Programs and planning (e.g., programs and transportation system management strategies, including technology and demand management programs), which allow for greater optimization of existing transportation infrastructure

Regional programs exist that were put in place prior to SB 375 requirements taking effect which set the Tulare County region on a course to reduce emissions from car and light truck travel and better coordinate transportation, land use and housing planning. Most notable of these regional programs is Measure R. Since 2006, the increase of transit service and construction of pedestrian/bike paths has significantly increased due to Measure R.

The specific transportation projects and improvements included in the RTP/SCS are listed in detail in the Action Element (Chapter D).

CLEAN AIR ACT CONFORMITY

The SCS must allow the RTP to comply with Section 176 of the federal Clean Air Act (42 USC 7506) requiring that the RTP demonstrate that it conforms with the state implementation plan, and that it will not cause or contribute to any new violation of any standard, increase the frequency or severity of any existing violation of any standard, or delay timely attainment of any standard or any required interim emission reductions or other milestones in each air basin. TCAG prepares and adopts concurrently with the RTP an air quality conformity analysis (Appendix 2-P) to ensure that the RTP/SCS meets the federal conformity requirements.

The principal requirements of the transportation conformity regulation for Transportation Improvement Program (TIP)/RTP assessments are: (1) the TIP and RTP must pass an emissions budget test with a budget that has been found to be adequate by EPA for transportation conformity purposes, or an interim emission test; (2) the latest planning assumptions and emission models must be employed; (3) the TIP and RTP must provide for the timely implementation of transportation control measures (TCMs) specified in the applicable air quality implementation plans; and (4) consultation. The final determination of conformity for the TIP/RTP is the responsibility of the Federal Highway Administration and the Federal Transit Administration.

The Conformity Analysis report presents the documentation for all the requirements listed above for conformity determinations. The report has also addressed the updated documentation required under the transportation conformity regulation for the latest planning assumptions and the implementation of transportation control measures specified in the applicable air quality implementation plans.

The Conformity Analysis presents the results of the conformity tests. Separate tests were conducted for ozone, PM-10 and PM2.5 (1997 and 2012 PM2.5 standards, and 2006 24-hour PM2.5 standards). The applicable conformity tests were reviewed in Chapter 1. For each test, the required emissions estimates were developed using the transportation and emission modeling approaches required under the transportation conformity regulation. Table SCS-6.1 below presents results for ozone (ROG/NOx), PM-10 (PM-10/NOx), and PM2.5 (PM2.5/NOx) respectively, in tons per day for each of the horizon years tested.

As all requirements of the Transportation Conformity Regulation have been satisfied, a finding of conformity for the 2023 FTIP and the 2022 RTP is supported. Table SCS-

2022 RTP/SCS Air Quality Conformity Analysis Results

Standard	Analysis Year	Emissio	ns Total
		ROG (tons/day)	NOx (tons/day)
	2023 Budget	2.4	4.6
	2023	2.3	4.5
	2026 Budget	2.1	4.0
	2026	2.0	3.9
2008 and 2015			
Ozone	2029 Budget	1.8	3.7
	2029	1.8	3.5
	2031 Budget	1.7	3.5
	2031	1.6	3.2
	2037	1.3	2.8
	2046	1.1	2.6

TABLE SCS-6.1 RTP/SCS AIR QUALITY CONFORMITY ANALYSIS RESULTS

Standard	Analysis Year	Emissions Total			
		PM-10 (tons/day)	NOx (tons/day)		
	2020 Budget	3.4	8.4		
	2022	2.5	6.4		
	2020 Budget	3.4	8.4		
PM-10	2029	2.6	3.6		
1 M-10					
	2020 Budget	3.4	8.4		
	2037	2.5	2.9		
	2020 Budget	3.4	8.4		
	2046	2.6	2.7		
Standard	Analysis Year	Emissio	ns Total		
Standard	Analysis Year	Emission PM2.5 (tons/day)	ns Total NOx (tons/day)		
Standard	Analysis Year 2020 Budget	Emission PM2.5 (tons/day) 0.4	ns Total NOx (tons/day) 8.5		
Standard	Analysis Year 2020 Budget 2023	Emission PM2.5 (tons/day) 0.4 0.3	ns Total NOx (tons/day) 8.5 4.7		
Standard	Analysis Year 2020 Budget 2023	Emission PM2.5 (tons/day) 0.4 0.3	ns Total NOx (tons/day) 8.5 4.7		
Standard	Analysis Year 2020 Budget 2023 2020 Budget	Emission PM2.5 (tons/day) 0.4 0.3 0.4	ns Total NOx (tons/day) 8.5 4.7 8.5		
Standard 1997 24-Hour	Analysis Year 2020 Budget 2023 2020 Budget 2029	Emission PM2.5 (tons/day) 0.4 0.3 0.4 0.4 0.3	ns Total NOx (tons/day) 8.5 4.7 8.5 3.6		
Standard 1997 24-Hour PM2.5 Standard	Analysis Year 2020 Budget 2023 2020 Budget 2029	Emission PM2.5 (tons/day) 0.4 0.3 0.4 0.4 0.3	ns Total NOx (tons/day) 8.5 4.7 8.5 8.5 3.6		
Standard 1997 24-Hour PM2.5 Standard	Analysis Year 2020 Budget 2023 2020 Budget 2029 2020 Budget	Emission PM2.5 (tons/day) 0.4 0.3 0.4 0.4 0.3 0.4 0.4	ns Total NOx (tons/day) 8.5 4.7 8.5 3.6 8.5		
Standard 1997 24-Hour PM2.5 Standard	Analysis Year 2020 Budget 2023 2020 Budget 2029 2020 Budget 2029 2020 Budget 2037	Emission PM2.5 (tons/day) 0.4 0.3 0.4 0.4 0.3 0.4 0.4 0.3	ns Total NOx (tons/day) 8.5 4.7 8.5 3.6 8.5 2.9		
Standard 1997 24-Hour PM2.5 Standard	Analysis Year 2020 Budget 2023 2020 Budget 2029 2020 Budget 2029 2020 Budget 2037	Emission PM2.5 (tons/day) 0.4 0.3 0.4 0.4 0.3 0.4 0.4 0.3	ns Total NOx (tons/day) 8.5 4.7 8.5 3.6 8.5 8.5 2.9		
Standard 1997 24-Hour PM2.5 Standard	Analysis Year 2020 Budget 2023 2020 Budget 2029 2020 Budget 2037 2020 Budget 2020 Budget 2037 2020 Budget	Emission PM2.5 (tons/day) 0.4 0.3 0.4 0.4 0.3 0.4 0.3 0.4 0.3	ns Total NOx (tons/day) 8.5 4.7 8.5 3.6 8.5 2.9 8.5 8.5		

TABLE SCS-6.1 (CONT.) RTP/SCS AIR QUALITY CONFORMITY ANALYSIS RESULTS

Standard	Analysis Year	Emissions Total			
		PM2.5 (tons/day)	NOx (tons/day)		
	2023 Budget	0.4	5.2		
	2023	0.3	4.7		
1997 Annual	2023 Budget	0.4	5.2		
	2029	0.3	3.6		
PM2.5 Standard					
	2023 Budget	0.4	5.2		
	2037	0.3	2.9		
	2023 Budget	0.4	5.2		
	2046	0.3	2.7		

Standard	Analysis Year	Emissions Total			
		PM2.5 (tons/day)	NOx (tons/day)		
	2023 Budget	0.4	5.3		
	2023	0.3	4.9		
2024 Budget		0.4	5.1		
	2024	0.3	4.6		
2006 PM2.5					
Winter 24-Hour	2024 Budget	0.4	5.1		
Standard	2031	0.3	3.5		
	2024 Budget	0.4	5.1		
	2037	0.3	3.0		
	2024 Budget	0.4	5.1		
	2046	0.3	2.8		

Standard	Analysis Year	Emissions Total		
		PM2.5 (tons/day)	NOx (tons/day)	
	2022 Budget	0.4	6.9	
	2022	0.3	6.4	
	2022 Budget	0.4	6.9	
	2025	0.3	4.3	
2012 Appual				
PM2 5 Standard	2022 Budget	0.4	6.9	
(Moderate)	2029	0.3	3.6	
(moderate)				
	2022 Budget	0.4	6.9	
	2037	0.3	2.9	
	2025 Budget	0.4	6.9	
	2046	0.3	2.7	

Standard	Analysis Year	Emissions Total			
		PM2.5 (tons/day)	NOx (tons/day)		
	2022 Budget	0.4	6.9		
	2022	0.3	6.4		
	2025 Budget	0.4	6.9		
	2025	0.3	4.3		
2012 Annual					
PM2.5 Standard	2025 Budget	0.4	6.9		
(Serious)*	2029	0.3	3.6		
	2025 Budget	0.4	6.9		
	2037	0.3	2.9		
	2025 Budget	0.4	6.9		
	2046	0.3	2.7		

* UPCOMING BUDGET TEST – Note: EPA action is pending as of this analysis. The 2012 PM2.5 Moderate Budget Test will be used if EPA doesn't determine adequacy or approval of the new Serious Area Budgets before Federal approval of the 2022 RTP Conformity Analysis

PERFORMANCE RESULTS

To evaluate alternative scenarios and guide selection of the preferred RTP/SCS scenario, TCAG applied performance measures related to goal areas proposed in the Policy Element (Chapter 2). These performance measures allowed quantification, comparison, and evaluation of the effectiveness of the alternative land use and transportation scenario candidates in achieving the plan goals.

The preferred RTP/SCS scenario ultimately selected by the TCAG Governing Board, based on this information and public input, best achieves the plan goals, performing well against every performance measure. The RTP/SCS preferred scenario also did better across virtually all performance measures and goal areas than the No Project scenario, which represents the forecast conditions that would apply if the RTP/SCS were not adopted.

Table SCS-6.1 lists performance results for the 2022 RTP/SCS.

TABLE SCS-7.1 RTP/SCS PERFORMANCE RESULTS

Performance Measure	Units	Preferred Scenario – Cross-Valley Corridor Blueprint Plus	Alternative Scenario - Blueprint Plus	Alternative Scenario – Blueprint (Old Plan)	Alternative Scenario – Trend (Future Baseline)	Alternative Scenario – No Project
Per Capita Greenhouse Gas Reduction* * Only preferred scenario meets -13% (2020) and -16% (2035) ARB Targets	Percentage Change CO2 Emissions (Auto & Light Truck) from 2005	2020: -13.7% 2035: -16.2% 2046: -17.6%	2020: -13.7% 2035: -15.4% 2046: -16.1%	2020: -13.7% 2035: -12.1% 2046: -12.7%	2020: -13.7% 2035: -11.3% 2046: -11.4%	2020: -13.7% 2035: -14.3% 2046: -14.8%
Increased Urban Residential Density (30%)	2046 Gross Housing Units per Acre of New Development	6.5	6.4	6.1	4.9	4.9
Reduced Vehicle Miles Travelled (VMT)	2046 VMT per Weekday, All Vehicles and Purposes (x1000)	12,242	12,299	12,726	12,877	12,465
Reduced Criteria Air Emissions**	2046 NOx Tons/Weekday	2.6837	2.6963	2.7897	2.8230	2.7327
** All Scenarios Pass	2046 ROG Tons/Weekday	0.9008	0.9050	0.9363	0.9475	0.9171
Conformity	2046 PM10 Tons/Weekday	0.7157	0.7191	0.7440	0.7529	0.7288
	2046 PM2.5 Tons/Weekday	0.2902	0.2916	0.3017	0.3053	0.2955
Reduced Commute Times	2046 Average Trip Time (Minutes)	13.12	13.13	13.12	13.07	13.11
Proximity of Housing to Jobs	2046 Average Trip Length (Miles)	11.53	11.53	11.53	11.47	11.48
Improved Reliability of the Road System	2046 Weekday Congested Peak Hour VMT (All Vehicle Classes)	44,740	42,168	190,888	180,694	296,197
Increased Use of Active Transportation Modes	2046 Mode Share Bike/Ped. (Percentage of All Trips)	1.11/6.30	1.10/6.19	1.13/6.33	1.12/6.17	1.08/5.86

TABLE SCS-7.1 (CONTINUED)

Performance Measure (Continued)	Units	Preferred Scenario – Cross-Valley Corridor Blueprint Plus	Alternative Scenario - Blueprint Plus	Alternative Scenario – Blueprint (Old Plan)	Alternative Scenario – Trend (Future Baseline)	Alternative Scenario – No Project
Expanded Use of Transit	2046 Transit Ridership	22,702	20,818	21,047	19,161	18,596
Decreased Consumption of Land	Acres Consumed 2021-2046	6,849	6,913	7,308	9,193	9,193
Decreased Consumption of Important Farmland	Acres of Important Farmland Consumed Outside SOI 2021- 2046	1,377	1,404	1,475	2,205	2,205
Reduced Impact on Environmental Resources (San Joaquin Valley Green Print)	Acres of Critical Habitat Area Consumed for New Urban Growth 2021-2046	144.0	144.0	163.0	176.0	176.0
Reduced Impact on Environmental Resources (San Joaquin Valley Green Print)	Acres of Present Vernal Pools Area Consumed for New Urban Growth 2021- 2046	0	0	0	0	0
CO2 Emissions per Household	CO2 tons per year	8.8	8.8	9.0	9.9	9.9
Water Consumption per Household	Water gallons per day	242.8	243.7	252.1	288.5	288.5
Energy Consumption per Household	Million BTUs per year	94.4	94.6	96.9	106.6	106.6

CEQA INCENTIVE

SB 375 has a policy promoting a priority on infill, enhanced by SB 226 and SB 743, allowing for CEQA streamlining. SB 226 streamlined environmental review for eligible infill projects under CEQA by broadening the definition of an infill project. Qualifying infill projects can avoid environmental review of impacts that were addressed in prior, program-level analysis or where local development standards already mitigate them. Project proponents can also analyze environmental impacts specific to the project through a more streamlined CEQA process. SB 743 paves the way to make VMT the primary measurement for CEQA review in transportation analysis, rather than LOS, with statewide implementation on July 1, 2020. Measuring VMT rather than LOS opens the door to a greater level of infill, as under current LOS CEQA measurements, a large development such a high-density mixed-use development would have to mitigate auto delays from their projects in the surrounding areas. Using VMT measurements, the same project may pass CEQA transportation impacts because it may reduce VMT, while still increasing auto delay.

RESIDENTIAL / MIXED-USE PROJECTS

Residential and mixed-use projects that are consistent with the SCS qualify for streamlined CEQA review if at least 75 percent of the total building square footage consists of residential use (or a project that is a TPP). If a project meets these requirements and is consistent with the use designation, density, building intensity and applicable policy of the SCS, any environmental review conducted will not be required to discuss growth inducing impacts; any project specific or cumulative impacts from cars and light-duty truck trips generated by the project on climate change or the regional transportation network; or a reduced density alternative addressing the effects of vehicle trips generated by the project.

TRANSIT PRIORITY PROJECTS (TPP)

A Transit Priority Project (TPP) is eligible for CEQA streamlining if it is consistent with the SCS; contains at least 50 percent residential use; is proposed to be developed at a minimum 20 dwelling units per acre; and is located within ½ mile of a major transit stop or high-quality transit corridor that is included in the RTP; this SCS defines such areas near transit as "Transit Priority Areas (TPAs).

Figure SCS-8.1 represents existing Transit Priority Areas in the Visalia-Tulare Urban Area, with an existing high-quality transit corridor on Mooney Blvd with frequent headways, showing room for development and infill along its path. Figure SCS-8.1also displays the planned Phase I CVC Express Service and CVC Station location Transit Priority Areas on a county-wide level, the major transit centers located in Visalia, Tulare, Porterville, and planned transit centers in Goshen, Farmersville, Exeter, Lindsay, and Strathmore. The Cross Valley Corridor (CVC) Phase II would implement a BRT service eventually leading to a major passenger rail service (Phase III) that spans Kings and Tulare counties connecting Hanford-Lemoore with Visalia-Tulare and Porterville, using historically preserved right of way on the San Joaquin Valley Railroad Corridor. Additional existing satellite Transit Priority Areas are located near the transit centers in Dinuba and Woodlake and the planned transit center in Cutler-Orosi that will connect to the CVC system via the existing TCAT service.

Note: Please contact TCAG Staff for a more detailed Transit Priority Area visualization and description than provided in Figure SCS-8.1.

If a project meets these criteria, it may be analyzed under a new environmental document created by SB 375, called the Sustainable Communities Environmental Assessment (SCEA), or through an EIR for which the content requirements have been reduced. Alternatively, a TPP can be considered a Sustainable Communities Project (SCP) and be eligible for a full CEQA exemption if it further meets the additional requirements beyond the base criteria.

The land use input for the SCS was created with the use of Traffic Analysis Zones (TAZ) and housing unit and job numbers. The housing unit and job numbers used in the SCS do not represent detailed, parcel-level land use designations such as those found within a local jurisdiction's general plan, but rather represent the aggregation of multiple land uses, densities and intensities that are expected to preponderate or average out within a neighborhood-sized area by 2035. The lead agency, not TCAG, will be responsible for making the determination of consistency for CEQA streamlining purposes, pursuant to the provisions of SB 375, for any given proposed project. See Govt. Code § 65080(b)(2). One way of determining consistency is if a proposed residential/mixed use or TPP conforms with the housing unit and job numbers designated for a TAZ.

It is important to note that the housing unit and job numbers are a potential ultimate average for the TAZ—and are not an absolute project-specific requirement that must be met to determine consistency with the SCS. In other words, the SCS was not developed with the intent that each project to be located within any given TAZ or must exactly equal the density and relative use that are indicated by the SCS housing unit and job numbers for the project to be found consistent with the SCS's density, building intensity and applicable policies. Instead, any given project, having satisfied all of the statutory requirements of either a residential/mixed-use project or TPP as described above, may be deemed by the lead agency to be consistent with the SCS so long as the project does not prevent achieving the estimated average uses, densities and building intensities indicated by the housing unit and job numbers within the TAZ, assuming that the TAZ will be built-out under reasonable local planning and zoning assumptions.

FIGURE SCS-8.1 2022 RTP/SCS BLUEPRINT PLUS SCENARIO



RTP / SCS NEXT STEPS

The 2022 RTP/SCS is first and foremost a transportation plan. However, the transportation network in the RTP/SCS and the growth patterns envisioned in the preferred scenario must complement each other. Integration of transportation and land use is essential for improved mobility and access to transportation options, as well as meeting the region's GHG reduction target.

SB 375 calls for the integration of land use policies with transportation investments and asks that Metropolitan Planning Organizations (MPOs) identify, quantify to the extent possible, and highlight these co-benefits throughout the processes. To achieve the goals of the RTP/SCS, public agencies at all levels of government will need to implement a wide range of strategies that focus on four key areas:

- A Land Use growth pattern that accommodates the region's future employment and housing needs, and protects sensitive habitat and natural resource areas
- A Transportation Network that consists of public transit, highways, local streets, bikeways, and walkways
- Transportation Demand Management (TDM) measures that reduce peak-period demand on the transportation network
- Transportation System Management (TSM) measures that maximize the efficiency of the transportation network

EVALUATION AND REVISION

TCAG will update its RTP/SCS again in 2026, in accordance with the current federal and state laws, and review its progress implementing strategies identified in this plan. In March 2018, CARB revised TCAG's GHG emission reduction targets to -13% in 2020 and -16% in 2035; the 2022 RTP/SCS was developed to meet these targets. It is unknown at the time of the adoption of this plan, if the 2026 RTP/SCS update with be subject to these same targets, or new ones. TCAG has continued to invest in resources for SCS development and evaluating sustainable growth scenarios. TCAG is developing an activity-based travel demand model (ABM) with the objective of having it ready for use in the next RTP/SCS development cycle culminating in the 2026 RTP/SCS update. The ABM has inherently more sensitivity to policy questions and strategies and how these might impact travelers at an individual level. The ABM requires more input data and careful interpretation in comparison to the traditional (tripbased) model used in this RTP/SCS cycle.

TCAG will also track its progress in implementing its RTP/SCS strategies in conjunction with the preparation and adoption of its Overall Work Program (OWP) and Annual Budget. The OWP / Budget process provides an opportunity for TCAG to allocate staff resources and funding to implement short-term and mid-term strategies contained within the RTP/SCS. In addition, TCAG will periodically monitor the progress being made by

the State, local jurisdictions, and other agencies and entities in implementing the strategies identified in this plan.

MONITORING PROGRESS

While SB 375 prioritizes meeting GHG emission reduction targets, TCAG has established additional goals in its RTP/SCS that will lead to overall improvement in the quality of life in the region. It is important that TCAG continue to improve its performance monitoring programs to track progress toward meeting these goals. The characteristics of the preferred scenario help to inform the planning assumptions, needs analysis, and performance measures of the Action Element.