

ARB Senate Bill 375 Target Update

Sacramento Workshop
March 9, 2017

California Environmental Protection Agency
 **Air Resources Board**

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Today's Program

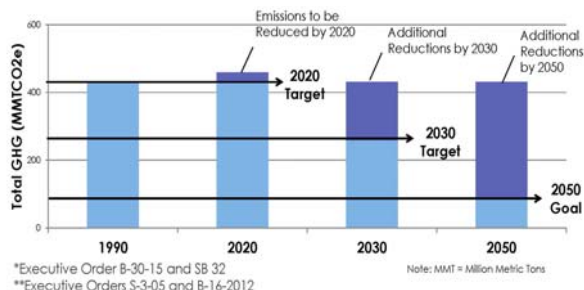
- Transportation Sector's Role in Meeting State Greenhouse Gas (GHG) Emissions Reduction Goals
- Questions and Discussion – Part I
- Senate Bill 375 Regional Target Update
- Questions and Discussion – Part II

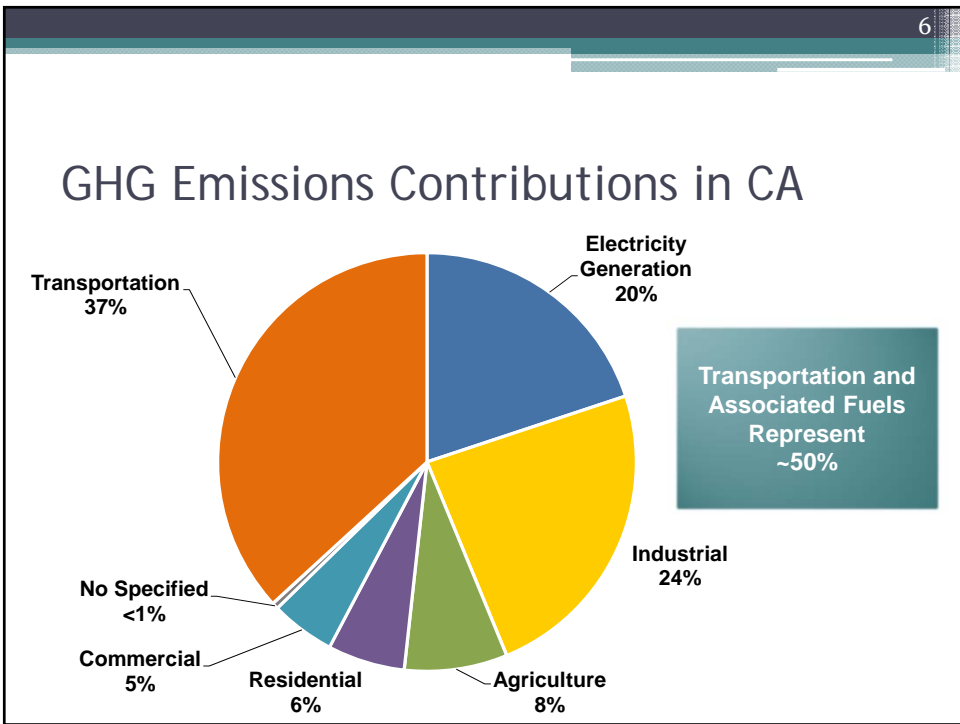
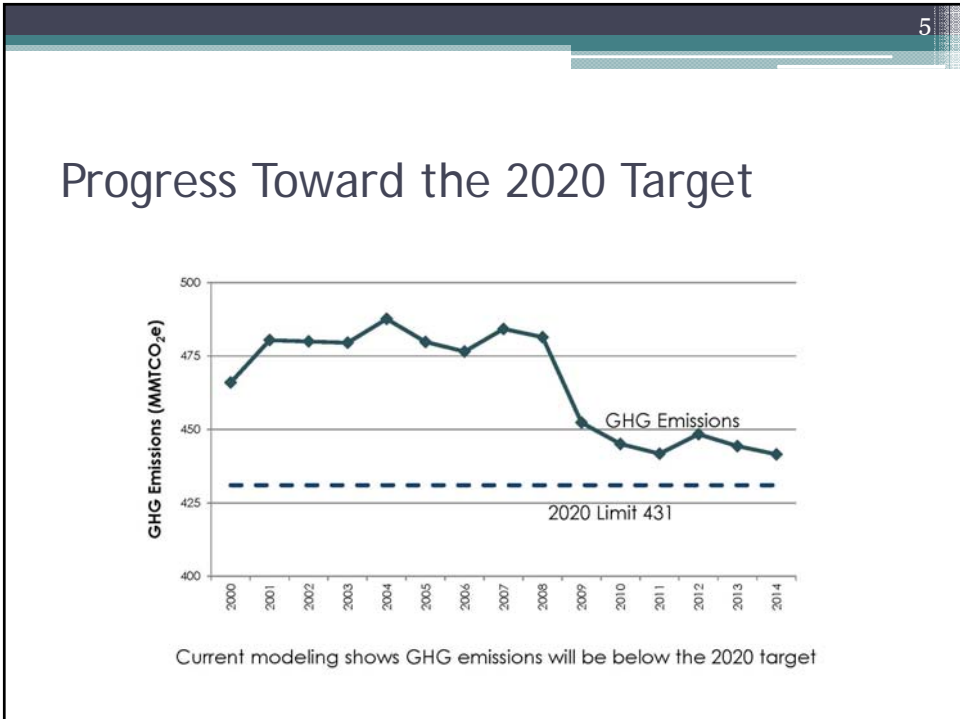
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Transportation Sector's Role in Meeting GHG Goals

CA's Greenhouse Gas Reduction Goals

- Below 1990 levels by 2020 (AB 32)
- 40% below 1990 levels by 2030 (SB 32)
- 80% below 1990 levels by 2050 (State's Goal)





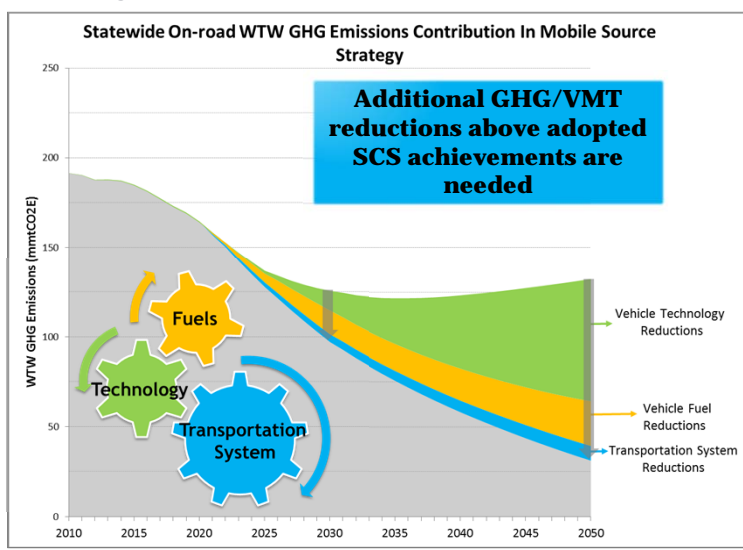
2017 Climate Change Scoping Plan Update



- Draft Plan released January 2017
- Establishes framework of action to meet most aggressive climate target in North America
 - 40% reduction in GHGs by 2030 compared to 1990 levels
 - Builds on California’s success reducing GHGs as well as lays out new actions
 - Includes input from a range of State agencies and public and stakeholder processes

www.arb.ca.gov/cc/scopingplan/scopingplan.htm

Scoping Plan Scenario: Transportation



Senate Bill 375 Target Update

SB 375 Overview

- California's 18 Metropolitan Planning Organizations (MPO) develop Sustainable Communities Strategies (SCS)
 - SCSs identify land use and transportation strategies to meet GHG reduction targets
 - Alternative Planning Strategies are prepared if an MPO is not able to meet the target
- ARB sets GHG reduction targets for the MPOs

Regional GHG Reduction Targets

- Originally adopted in 2010 for years 2020 and 2035
- ARB must update targets every 8 years
- Targets are set for each region at a percent reduction of passenger vehicle GHG emissions per person from 2005 levels

Target Update Considerations

- Progress to date
- Statewide planning for greenhouse gas reductions
 - 2017 Climate Change Scoping Plan Update
- MPO technical analysis and recommendations
- Stakeholder consultative process

Current Targets and SCS Performance: Big Four MPOs

MPO	Current Target		SCS Achievement	
	2020	2035	2020	2035
SACOG	-7%	-16%	-7.6%	-16%
SANDAG	-7%	-13%	-15%	-21%
SCAG	-8%	-13%	-8%	-18%
MTC/ABAG	-7%	-15%	-10%	-16%

Current Targets and SCS Performance: Eight San Joaquin Valley MPOs

MPO	Current Target		SCS Achievement*	
	2020	2035	2020	2035
Fresno COG	-5%	-10%	-8.5%	-10.5%
Kern COG			-14.1%	-16.6%
Kings CAG			-5.1%	-12.1%
Madera CTC			--	--
Merced CAG			--	--
San Joaquin COG			-24.4%	-23.7%
Stanislaus COG			-26%	-22%
Tulare CAG			-17.1%	-19.4%

* MPOs have provided preliminary updated modeling analyses to adjust these; see slides 27 and 37

Current Targets and SCS Performance: Six Other MPOs

MPO	Current Target		SCS Achievement	
	2020	2035	2020	2035
Butte CAG	1%	1%	-2%	-2%
Monterey Bay (AMBAG)	0%	-5%	-3.5%	-5.9%
San Luis Obispo COG	-8%	-8%	-9.4%	-10.9%
Santa Barbara CAG	0%	0%	-10%	-15%
Shasta RTA	0%	0%	-4.7%	-0.5%
Tahoe MPO	-7%	-5%	-12%	-7%

Progress To Date - Real Changes are Happening

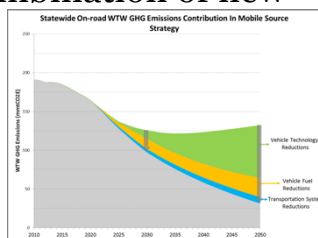
Already adopted SCSs have lead to real changes in planning and on the ground

- Transit oriented development
- Active Transportation
- Transit
- Zero Emission Vehicles (ZEV)

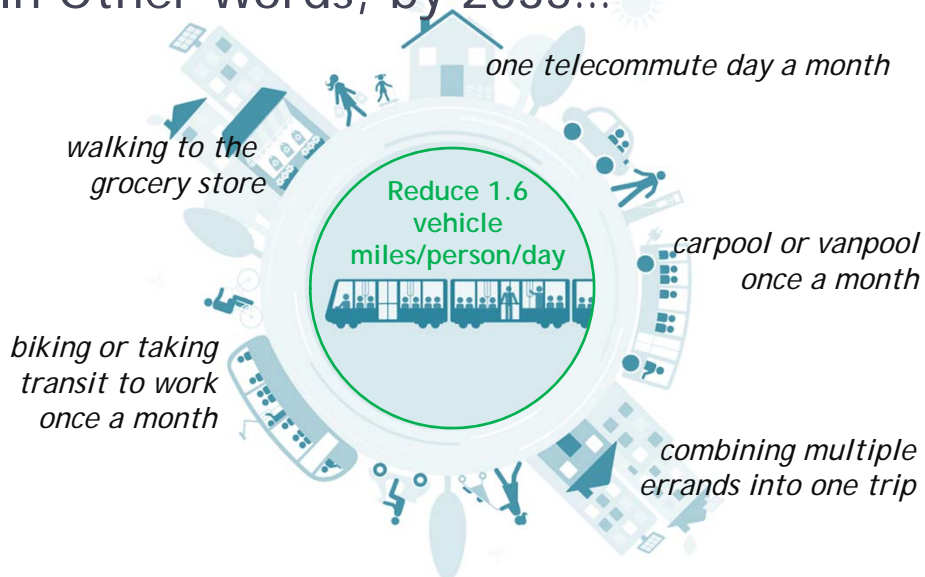


Statewide Planning for GHGs

- Scoping Plan Scenario: 7.5% VMT reduction from 2035 baseline in 2035 (15% by 2050)
- 50% more GHG/capita reduction from adopted SCSs
- Bridging the gap requires a combination of new State VMT actions and SB375
- Technologies and fuels aggressively deployed.
 - 100% ZEV sales by 2050



In Other Words, by 2035...



Scoping Plan: Identifies State-Level Strategies to Reduce VMT

- Explore pricing policies and increasing revenue
- Update and streamline CEQA
- Support local action and innovation
 - Funding (e.g. AHSC and TCC)
- Research emerging mobility technologies
- Update SB 375 targets to better align with 2030 climate goals

MPO Technical Analysis

- Target analysis work received:
 - Big Four MPOs: March 2017
 - Eight San Joaquin Valley MPOs: December 2016
 - Six Other MPOs: Summer 2016
- MPO analysis process differed by MPO group

Big Four MPOs Analysis

- Identify need to work harder to maintain current SCS performance levels
 - Declining transportation revenues
 - Increasing fuel efficiency and the cost of driving
- Target recommendations still forthcoming

Big Four MPOs Stress Tests

- Exploratory land use, transit, active transportation, pricing, EV market penetration scenarios compared to current adopted SCSs
 - Not fiscally constrained, and/or limited by regional, state, and federal rules
 - Range of additional GHG reductions between <1% to -5% in 2035 for land use, enhanced mobility, and technology strategies
 - Pricing achieved -1.5% to -5% reductions

Eight San Joaquin Valley MPOs

- Modeling improvements underway
 - Land use and socio-economic data
 - Reflecting 2012 CHTS data
 - Interregional travel
 - Auto operating cost assumptions
- Provide more accurate representation of current SCS plan achievement

Eight San Joaquin Valley MPOs (cont'd)

- Identify need to work harder to maintain current SCS performance levels
 - Economic recovery
 - Land use plan updates, vanpool and rideshare programs, active transportation plans, electric vehicle infrastructure
- Preliminary recommendations and technical analysis exceed reduction levels set in 2010; commit to maintaining same levels of reduction achieved in current SCSs

Eight San Joaquin Valley MPOs (cont'd)

MPO	SCS Achievement*	MPO Analysis*
	2035	2035
Fresno COG	-11%	>-11%
Kern COG	-13%	-13 to -14%
Kings CAG	-12%	-12%
Madera CTC	-	-15 to -20%
Merced CAG	-	-12.7%
San Joaquin COG	-14%	-14 to -15%
Stanislaus COG	-14%	-14 to -15%
Tulare CAG	-15%	-15 to -16%

* Based on preliminary updated modeling analysis. Values subject to change as model validation is completed.

Six Remaining MPOs

- Target recommendations and technical analysis exceed reduction levels established in 2010; 4 of 6 will meet or exceed performance of their currently adopted SCSs
- Reflect focus on adopted land use and transportation strategies, with caveat that MPOs will need to work hard to maintain needed resources/funding levels

Six Remaining MPOs (cont.)

MPO	SCS Achievement	MPO Analysis
	2035	2035
Butte CAG	-2%	-7%
Monterey Bay (AMBAG)	-5.9%	-6%
San Luis Obispo COG	-10.9%	-8%
Santa Barbara CAG	-15%	-15 to -17%
Shasta RTA	-0.5%	-3.5%
Tahoe MPO	-7%	-5%

Preliminary Discussion Targets
Based on Currently Available Data
and Analyses

2020 Targets

- Update to level of latest modeling of current SCS
- Future SCS evaluations for 2020 will focus on performance monitoring
- ARB developing statewide performance indicator database to monitor performance

2035 Target Approach

Big Four and Eight Valley MPOs

- Update current SCS performance based on latest modeling
- Consider
 - State climate goals – need to go beyond current SCSs
 - MPO analysis – challenges to achieving deeper reductions
 - Need for pricing signals and new revenue

Six Other MPOs

- Update to level of MPO analysis; at minimum maintain level of reductions identified in current SCSs

Challenges for Stronger Targets

Pricing signal and revenue

- Declining revenue due to lower fuel prices, fuel tax not adjusted for inflation, and fuel efficiency
- A key role for the state is to explore critical pricing and revenue strategies
- Also identify barriers for regional pricing mechanisms

Opportunities for Stronger Targets

- California Transportation Commission Road User Pilot Study
- SB1/AB1 Transportation Revenue Bills

Governor's Transportation Package
(Dollars in Millions)

Investment Category	Program	2017-18 Amount	Annualized Amount ⁴
	Active Transportation Program	\$100	\$100
	Local Road Maintenance & Repairs	\$206	\$1,163
Local Streets and Roads / Partnership Programs	Local Partnership Grants ²	\$0	\$250
	SB 375 Local Planning Grants	\$25	\$25
	Corridor Mobility Program	\$275	\$275
Transit	Transit Capital ³	\$485	\$400
State Highway Repair and Maintenance ¹	Pavement ³	\$129	\$997
	Bridges and Culverts	\$91	\$554
	Traffic Management Systems	\$12	\$100
	Maintenance	\$120	\$120
Trade Corridors	Improved Goods Movement ³	\$358	\$250
Total		\$1,801	\$4,234

¹ Excludes one-time loan repayments totaling \$706 million.
² Provides up to \$250 million per year beginning in 2019-19.
³ The 2017-18 totals include anticipated loan repayments.
⁴ Annualized amounts include \$100 million per year in Caltrans efficiency savings.

Opportunities for Stronger Targets (cont'd.)

- New strategies
- Enhance existing strategies
- Consider changes in socio-demographics



2035 Preliminary Discussion Target Range: Four Big MPOs

- MPO analysis indicates additional revenue and pricing tools needed to achieve current SCS VMT/GHG performance
- Additional State efforts needed for MPOs to achieve deeper GHG reductions
- Preliminary review of MPO stress test results indicate performance in range of -16 to -20+% with additional tools

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2035 Preliminary Discussion Target Range: Eight San Joaquin Valley MPOs

MPO	SCS Achievement*	MPO Analysis*	Preliminary Discussion Target Range
	2035	2035	2035
Fresno COG	-11%	>-11%	- >11% to -20+%
Kern COG	-13%	-13 to -14%	
Kings CAG	-12%	-12%	
Madera CTC	-	-15 to -20%	
Merced CAG	-	-12.7%	
San Joaquin COG	-14%	-14 to -15%	
Stanislaus COG	-14%	-14 to -15%	
Tulare CAG	-15%	-15 to -16%	

** Based on preliminary updated modeling analysis. Values subject to change as model validation is completed.*

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2035 Preliminary Discussion Target Range: Six Remaining MPOs

MPO	SCS Achievement	MPO Analysis	Preliminary Discussion Target Range
	2035	2035	2035
Butte CAG	-2%	-7%	Use MPO Analysis Target, except in case that SCS Achievement is greater – then update to level of SCS Achievement
Monterey Bay (AMBAG)	-5.9%	-6%	
San Luis Obispo COG	-10.9%	-8%	
Santa Barbara CAG	-15%	-15 to -17%	
Shasta RTA	-0.5%	-3.5%	
Tahoe MPO	-7%	-5%	

Next Steps and Schedule

	2017-2018
Staff Target Update Public Workshops	March 7, 2017 (Los Angeles) March 9, 2017 (Sacramento) March 14, 2017 (Fresno)
ARB Board Meeting Informational Item	March 23-24, 2017
ARB Draft Staff Report and Environmental Document Release	Spring 2017
ARB Final Staff Report and Environmental Document Release and ARB Board Target Adoption	Fall 2017
Update ARB Technical Methodology for Reviewing MPO SCS GHG Quantification	Late 2017 to Early 2018
SCSs Developed to Meet Updated Targets	2017+

Environmental Analysis Preparation

- Environmental Analysis (EA) will analyze potentially significant adverse impacts caused by reasonably foreseeable actions
 - Meets requirements of ARB's certified program under the California Environmental Quality Act (CEQA)
- The CEQA Environmental Checklist (CEQA Guidelines Appendix G) is used to identify and evaluate potential indirect impacts
- The EA will be an appendix to the Proposal for Updated SB 375 GHG Emissions Reduction Targets

Environmental Analysis (cont'd)

- The EA will include:
 - Description of reasonably foreseeable actions taken in response to the Target Update
 - Programmatic level analysis of potential adverse impacts caused by reasonably foreseeable actions
 - Beneficial impacts
 - Feasible mitigation measures to reduce/avoid significant impacts
 - Alternatives analysis
- Input invited at this early stage on appropriate scope and content of the EA
- Draft EA will be released for 45 day public comment period this summer

Question and Discussion - Part II

- We appreciate your input and hope you will provide feedback on:
 - Target update
 - Thoughts on approaches to updating the 2020 and 2035 targets?
 - What other approaches should we consider?
 - Potential issues to analyze as part of the Environmental Document

If viewing via webcast, please email comments to
Coastalrm@calepa.ca.gov

To submit comments online after the workshop please visit:
<https://www.arb.ca.gov/cc/sb375/sb375.htm>