

# Existing Control Program

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# Statewide Attainment Strategy

- Existing Program
  - Measures adopted or implemented through 2005
- New Measures
  - Measures adopted or implemented after 2005



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# Existing Program Measures

- Many measures currently reducing emissions
- Some reduce emissions at an accelerated rate through time
- Some already adopted but implemented in future years



# Primary Responsibility

- Air Resources Board
- U.S. Environmental Protection Agency
- Local Air Districts
- Transportation Planning Agencies
- Other State Agencies



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# Controls Must Overcome Growth

More....

- Cars and trucks
- Gasoline refueling
- Goods movement
- Energy consumption
- Construction equipment
- Architectural coatings
- Lawn and garden equipment
- Consumer products



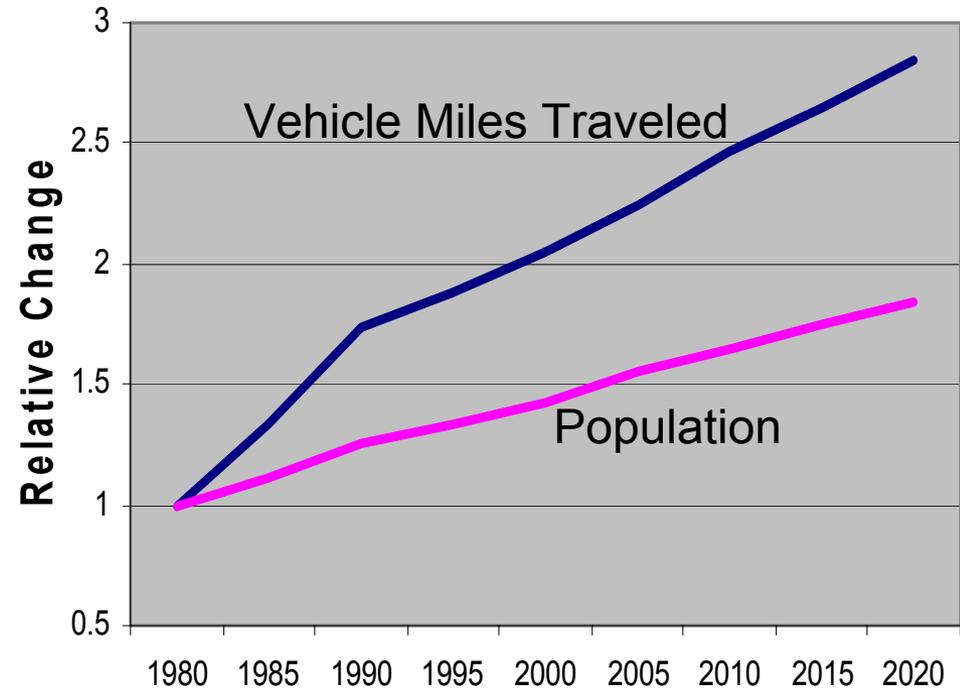
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# Mobile Sources

- Cleaner Engines
- Cleaner Fuels
- Keep Vehicles Clean
  - Smog Check
  - Heavy-Duty Inspection
- Clean-up Existing Fleet
  - Fleet Rules
  - Repowers, Retrofits
- Incentives

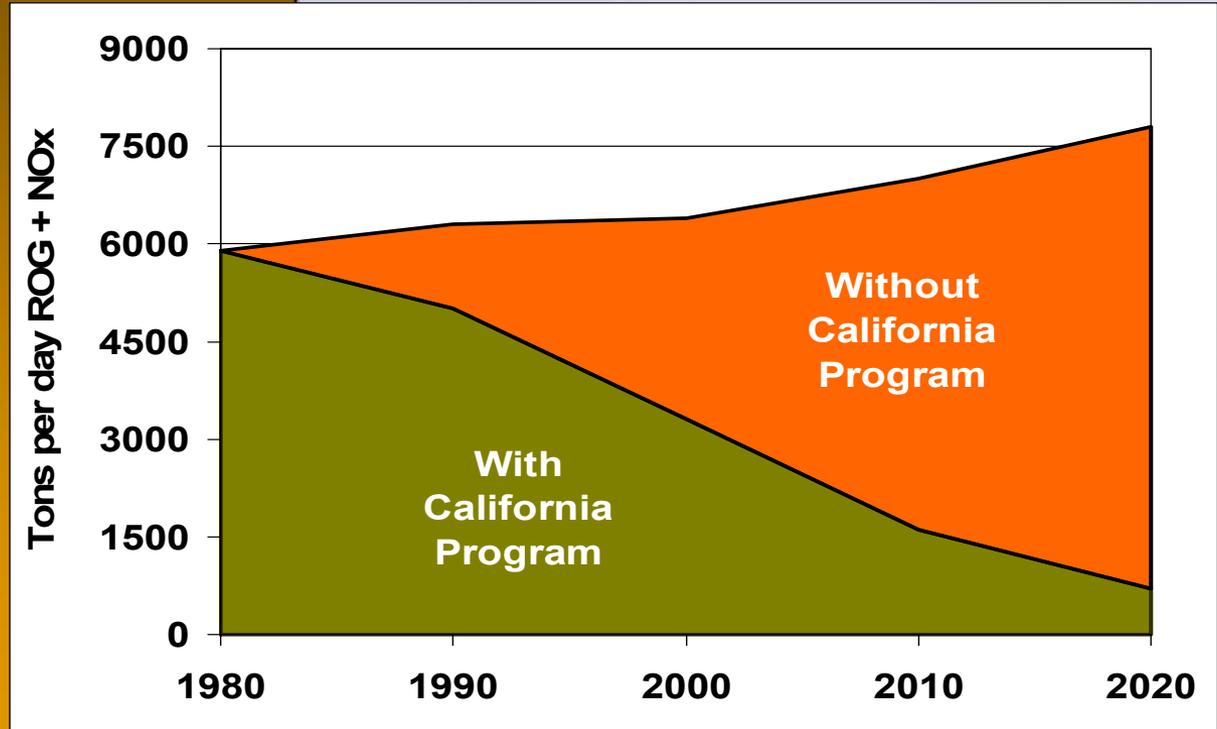


# More People, Even More Miles Traveled



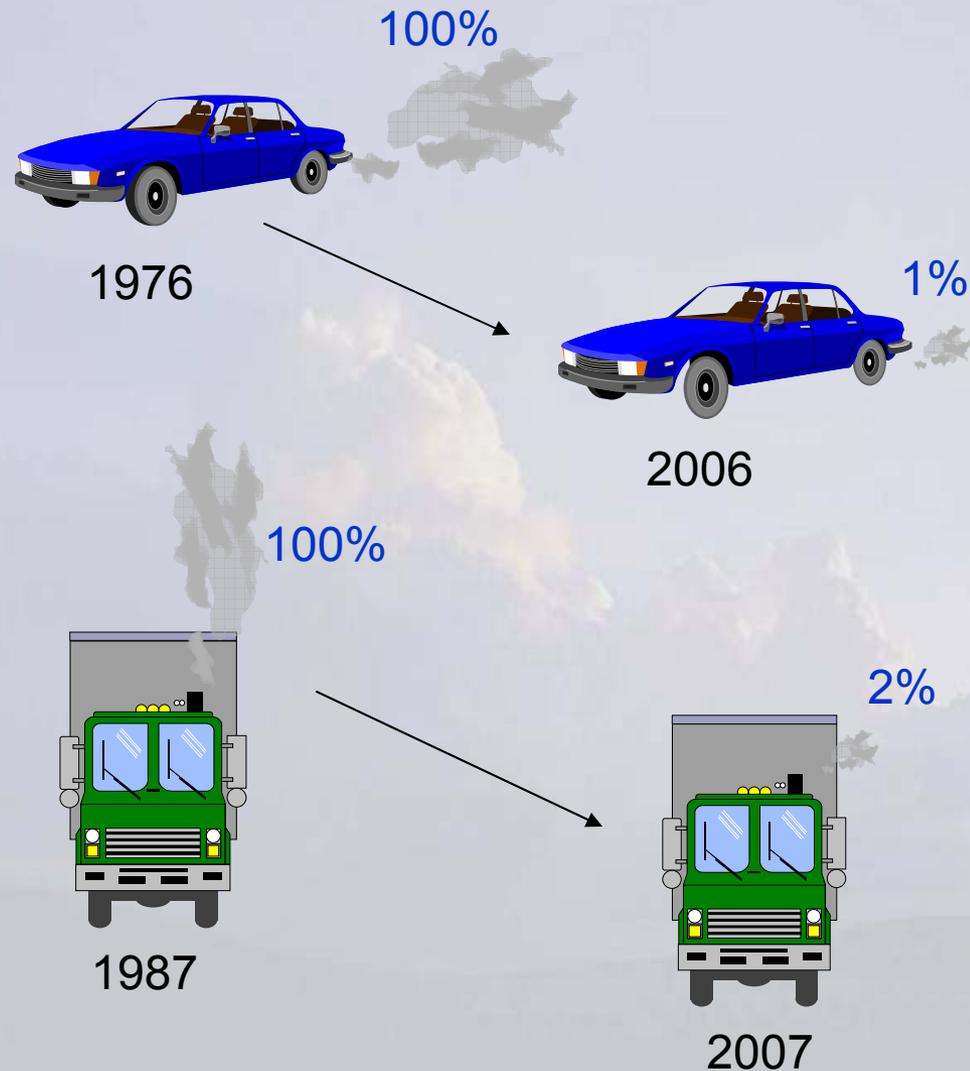
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# Cleaner On-Road Motor Vehicles



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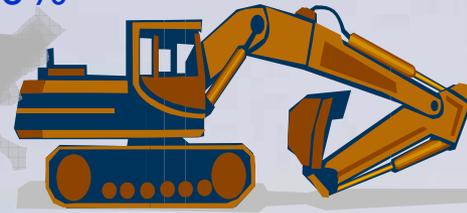
# Cleaner Cars and Trucks



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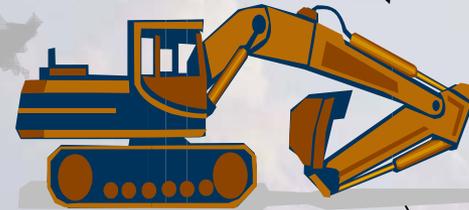
# Cleaner Construction and Mining Equipment

100%



Uncontrolled

15-20%



2008-2012

2%



2015



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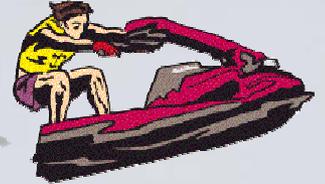
# Cleaner Watercraft

100%



1990

12%



2010

100%



1990

11%

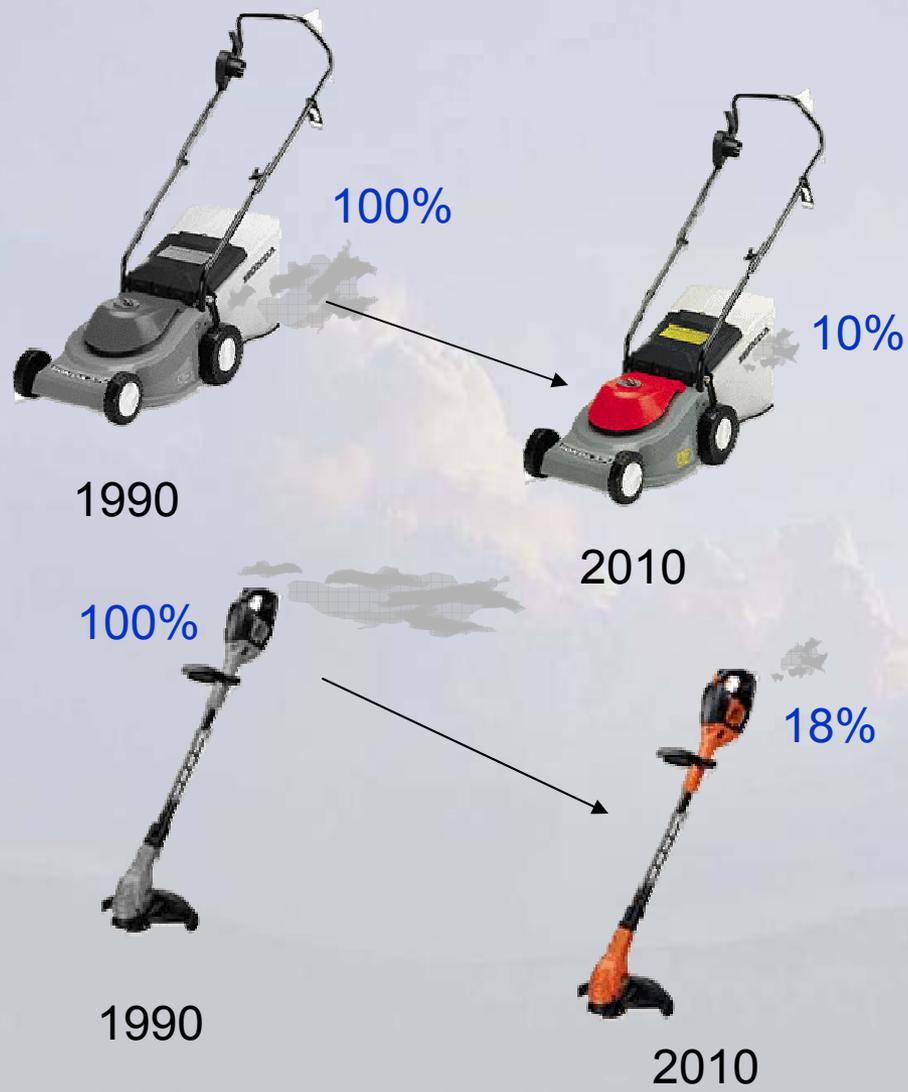


2010



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# Cleaner Lawn and Garden Equipment



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# Ships, Trains, and Planes

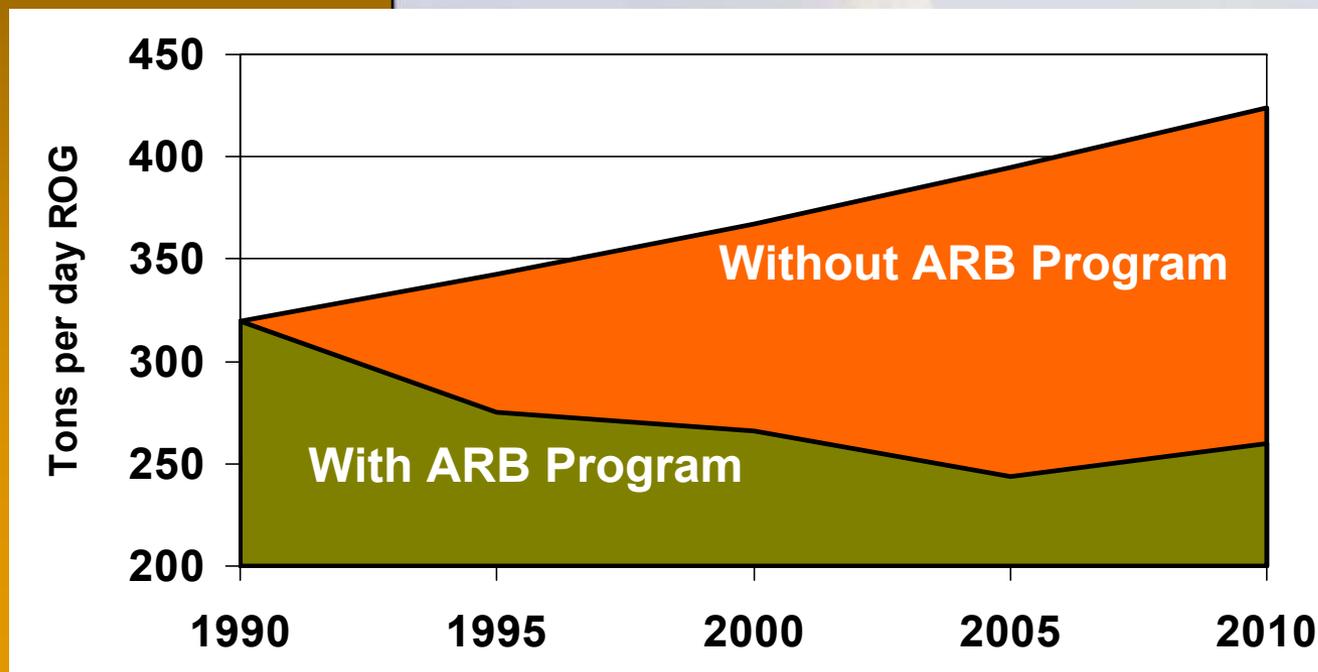
- Less authority to regulate
- Local, State, National, and International Effort
  - Standards
  - Agreements
  - Voluntary Efforts
  - Incentives



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# Consumer Products

- ARB Authority
- Emission limits for 50 product categories
- More controls needed as growth swallows gains



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# Other ARB Plans

- Diesel Risk Reduction Plan
- Goods Movement Emission Reduction Plan



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# Transportation Planning

- Air Quality Conformity
- Reduce Rate of Growth in Vehicle Travel
- Land Use Planning
- Transit, carpooling, biking, walking
- Regional Transportation Plans
- Regional Comprehensive Plans



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# Stationary and Areawide Sources

- Industrial
  - Factories
  - Power plants
- Commercial
  - Gas stations
  - Dry cleaners
- Residential
  - Fireplaces
  - Water heaters
- Spread over wide area
  - Paints
  - Dust



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# Innovative District Programs

- Cleanest stationary sources in U.S.
- South Coast RECLAIM
- San Joaquin Valley Indirect Source Rule
- San Joaquin Valley Confined Animal Facility Rule



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# Incentives

- Carl Moyer Program
- California Motor Vehicle Fee Program
- Federal CMAQ
- U.S. Energy Policy Tax Incentives
- Legislative Efforts
- Ballot Measures



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# Carl Moyer Program

- Grants to fund incremental cost to install modern engines or retrofit devices
- \$154 million spent over 6 years
  - 5000 engines cleaned up
  - Cost effective: \$3000/ton NO<sub>x</sub>
- New on-going funding beginning 2005
  - \$140 million/year
  - PM retrofits and vehicle scrap now eligible



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# CMAQ

Federal Congestion  
Mitigation and Air  
Quality Improvement  
Program

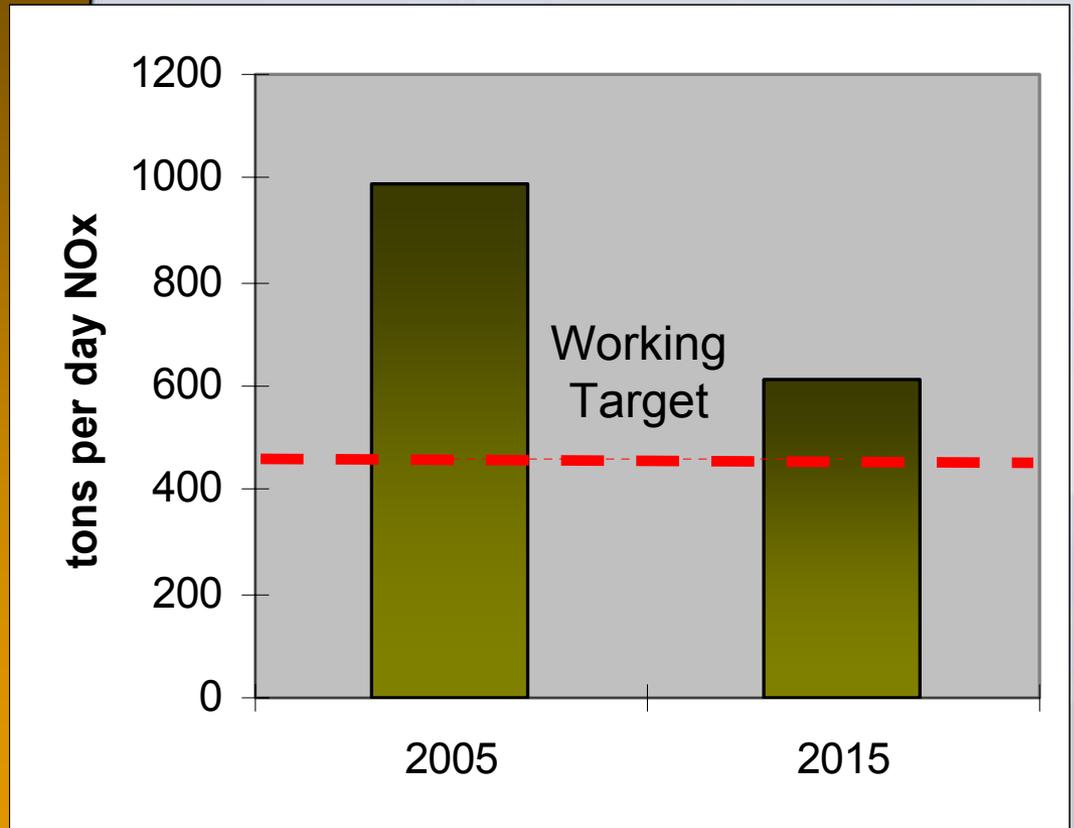
- \$430 million/yr in California
- \$250 million/yr in South Coast
- \$45 million/yr in San Joaquin Valley
- New requirements to give priority for diesel and cost-effective projects



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# Existing Program Benefit

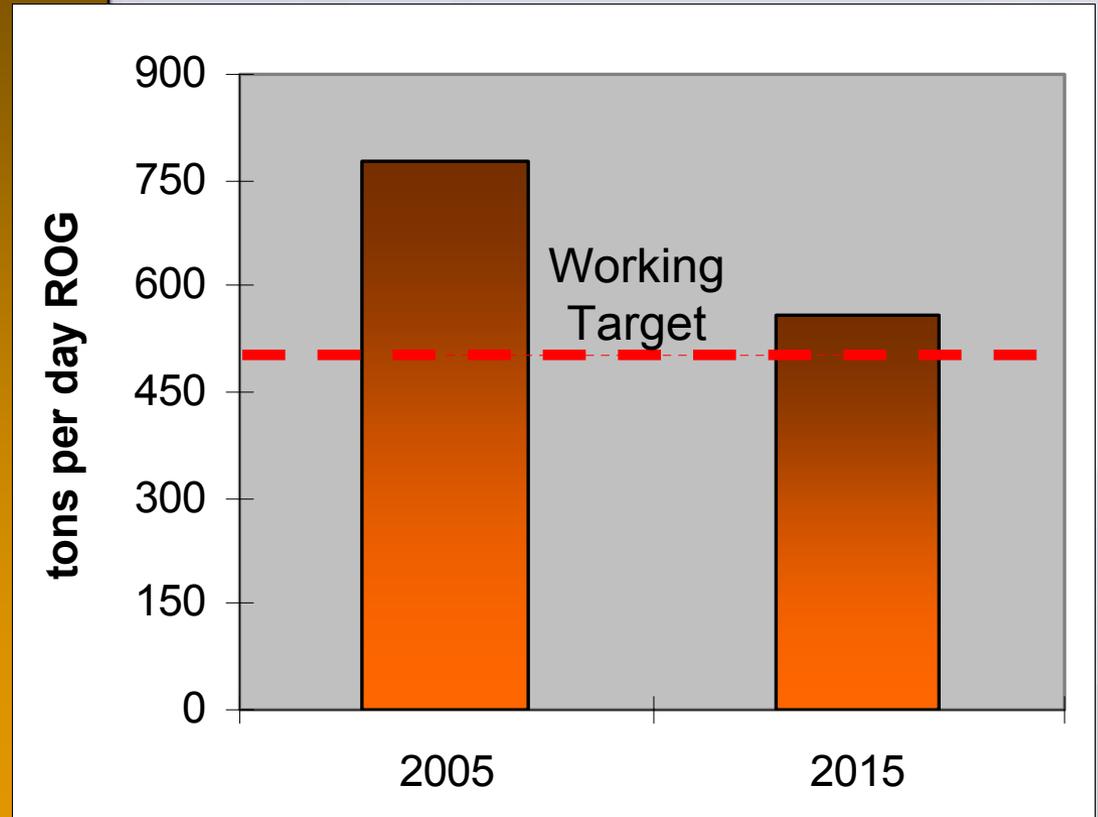
(NO<sub>x</sub>, South Coast)



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# Existing Program Benefit

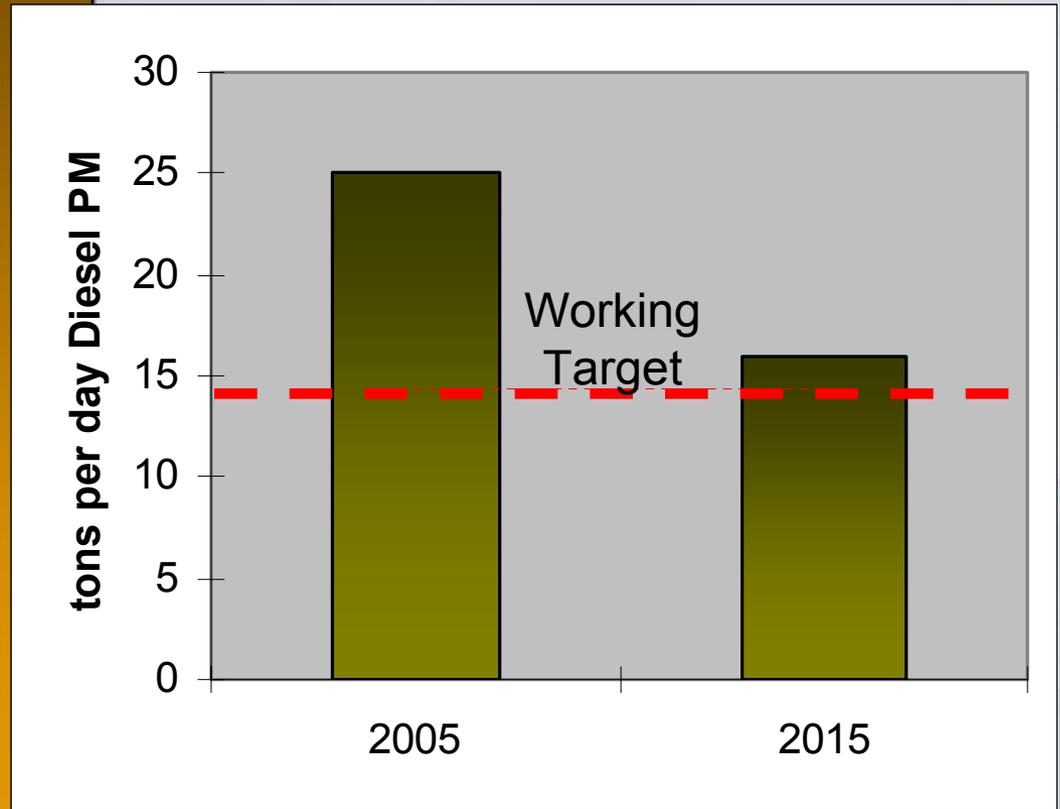
(ROG, South Coast)



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# Existing Program Benefit

(Diesel PM, South Coast)



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# Statewide Attainment Strategy



## New Measures:

- The Role of Goods Movement
- Diesel Engines
- Passenger Vehicles
- Other Sources
- Long-Term Concepts



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