



Oil and Gas Exploration and Production Emission Sources

Presentation for the
Air Quality Control Commission Retreat

May 15, 2008

Air Pollution Control Division

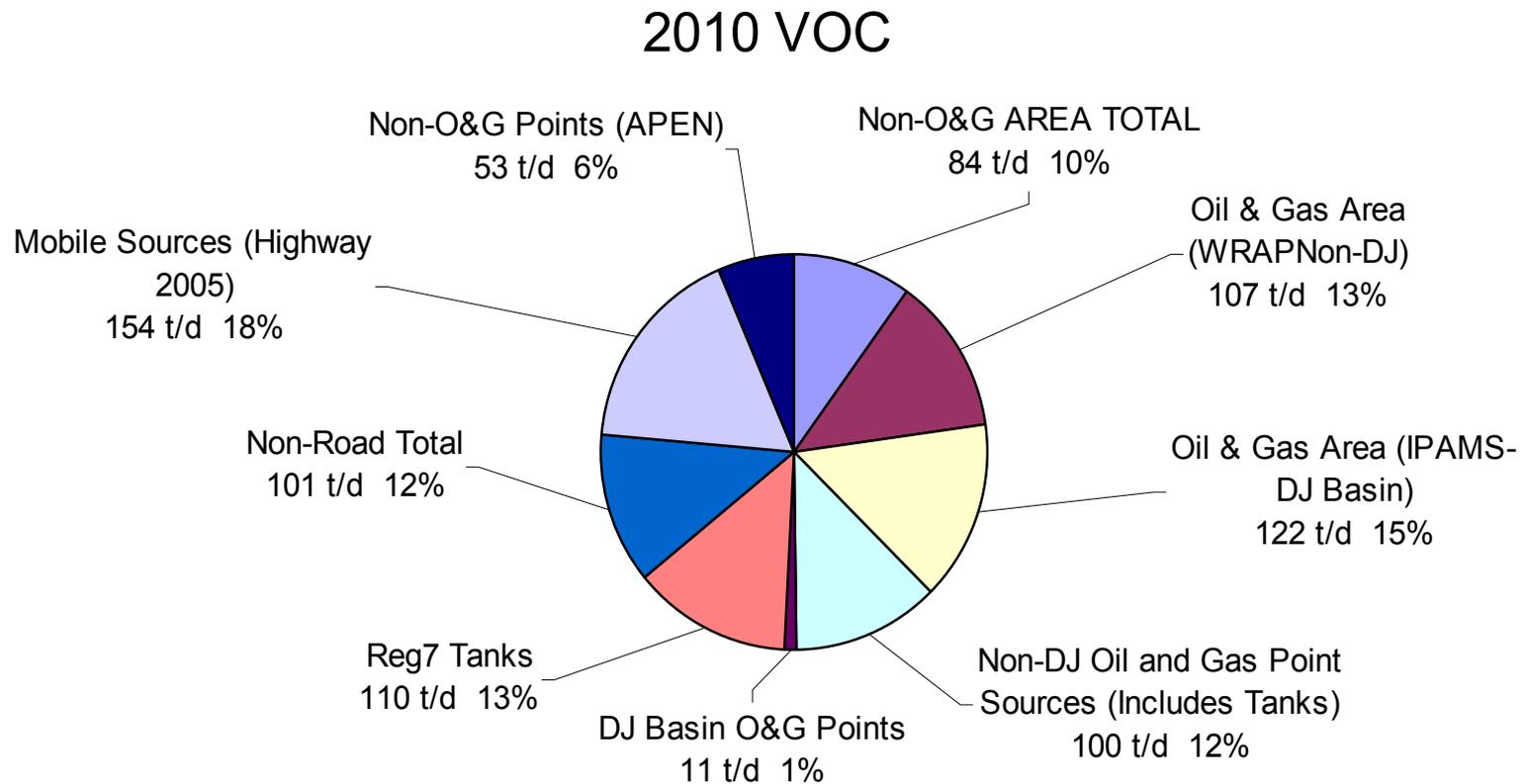


Approach to Statewide Oil and Gas Control Strategy Development

- Oil and gas is the largest VOC source category on the State
- Oil and gas development is rapid and projected to significantly expand – especially in western Colorado
- Strategies are being developed to control the growth in VOC and NO_x emissions from O&G
 - Pre-emptive – “keep clean areas clean”
 - Help prevent ozone nonattainment
 - Improve visibility

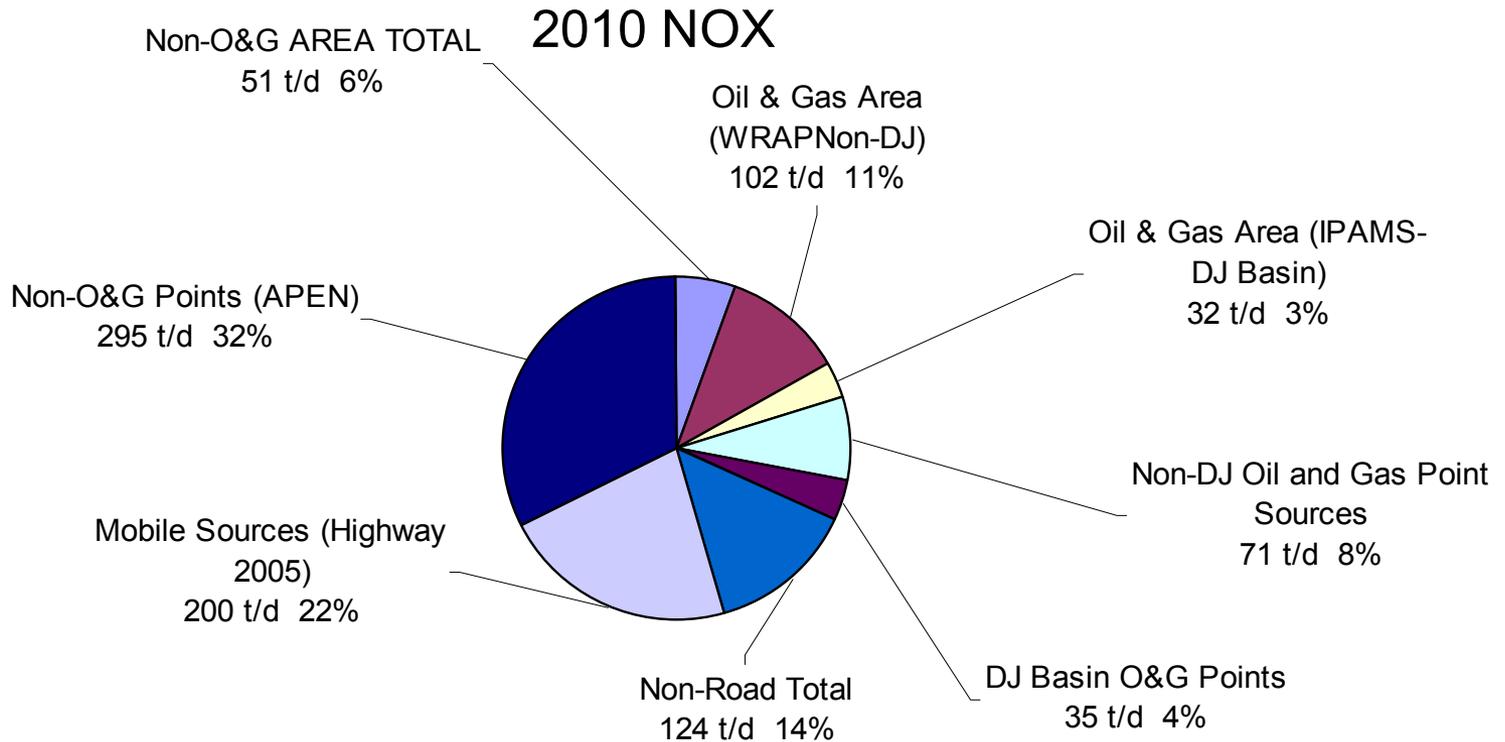
Statewide VOC Emissions – 2010

(4% increase since 2006)



Statewide NOx Emissions – 2010

(8% increase since 2006)





Approach to Statewide Oil and Gas Control Strategy Development

- All current regulatory programs remain in place
- Categorical Exemptions - Eliminate for Significant Oil and Gas Categories - New Sources (VOCs)
- Pneumatics – New, Modified (VOCs)
- Condensate Tanks – New, Modified (VOCs)
- Drill Rigs – New and Existing (NO_x, PM)
- Existing Engines – Retrofit (VOCs, CO, NO_x)



Elimination of Categorical Exemptions for Oil and Gas Sources

- Crude oil truck loading equipment
- Oil/gas production wastewater tanks
- Stationary Internal Combustion Engines meeting horsepower and hours of operation restrictions
- Condensate tanks with production 730 BBL/year or less
- Fuel burning equipment (includes heater treaters, separators, and dehydrator reboilers)
- Petroleum industry flares less than 5 tons per year (tpy) emissions
- Storage of butane, propane, LPG
- Crude oil storage tanks
- Surface water storage impoundment
- Internal combustion engines on drill rigs
- Venting of natural gas lines for safety purposes (for APEN purposes only)
- Oil and gas production activities including: well drilling, workovers, and completions (for APEN purposes only)