

Agricultural Open Burning Phase-Out and Ag Burn Alternatives Grant Program

Agricultural Biomass Conference

October 5, 2023

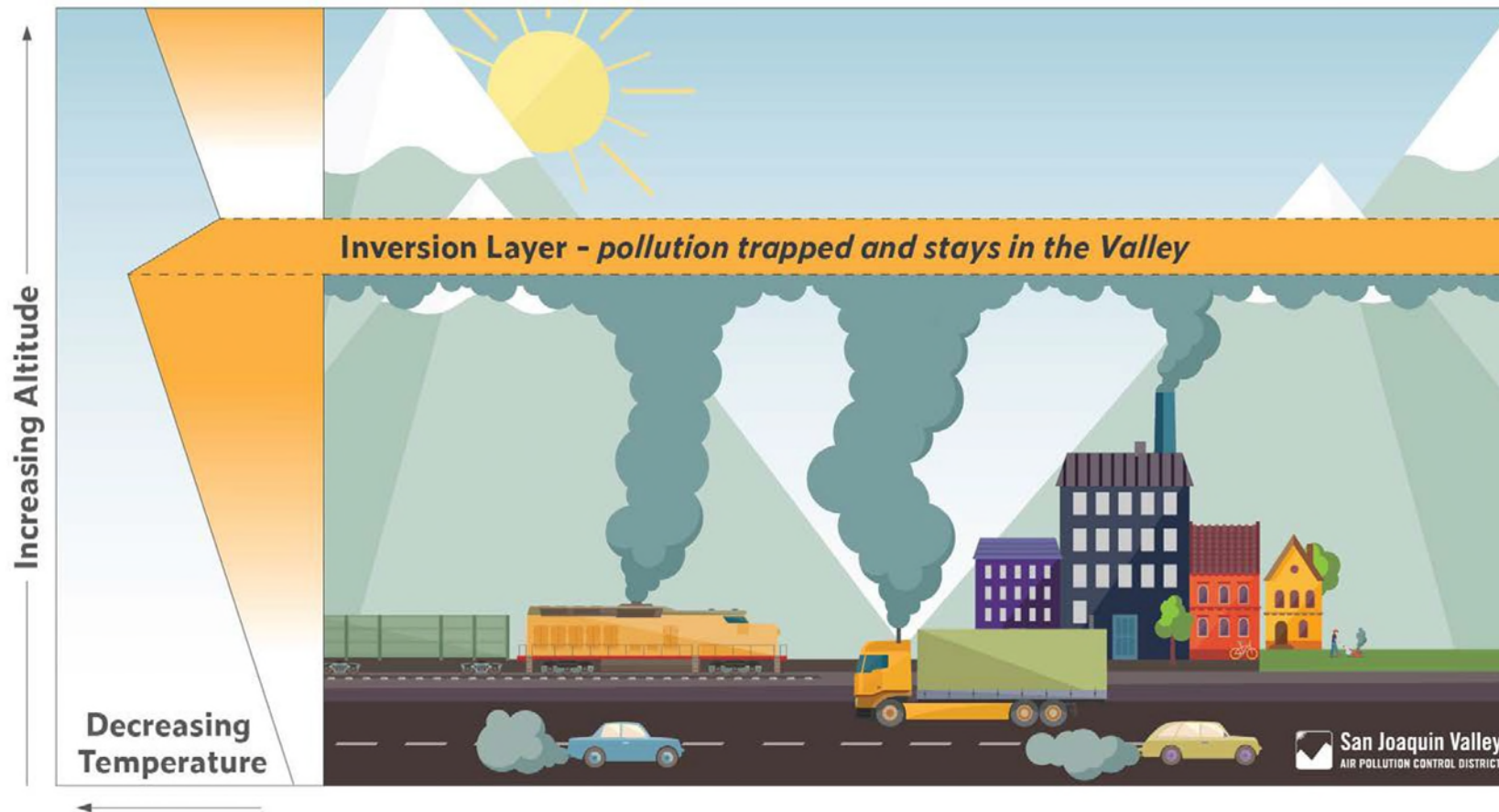
San Joaquin Valley's Air Quality Challenges

- Valley's challenges in meeting federal air quality standards unmatched due to unique combination of topography and meteorology
- Valley faced with variety of challenges including role as major goods movement corridor, high population growth, pollution transport from other areas, wildfires
- 7 of 10 most disadvantaged California communities located within the San Joaquin Valley



Valley's Air Quality Challenges (cont'd)

- Unique combination of topography and meteorological trap pollution within the Valley



Valley Efforts to Reduce Agricultural Open Burning

- Valley has toughest restrictions on agricultural burning in state (SB 705 only applies to San Joaquin Valley)
- District operates comprehensive Smoke Management System
 - Tightly regulated and enforced
 - Only authorized when projects will not impact air quality standards, smoke-sensitive areas, cause public nuisance
- Since 2005, District has prohibited burning from a majority of field crops, prunings, orchard removals, weed abatement, and other materials
- District Governing Board has prioritized continued efforts to identify and demonstrate new alternatives to reduce open burning, including establishing final phase-out strategy



Valley's Strategy for Phasing-Out Agricultural Burning

- In June 2021, Governing Board adopted and CARB approved final phase-out requirements for agricultural open burning:
 - Near-complete phase-out of agricultural open burning by January 1, 2025
 - Phase-out schedules that maximize reduction of tonnage of material burned as early as possible, taking into account feasibility of alternatives for different crop types
 - Smallest ag operations given most flexibility and longest time to adjust to phase-outs
 - Significant incentives required to assist growers with transition in the coming years due to limited availability and high cost of alternatives
- Currently in process of implementing and enforcing phase-out strategy
- Extensive outreach to Valley growers regarding phase-out requirements and available resources for alternative practices

Burn Windows for Agricultural Burning

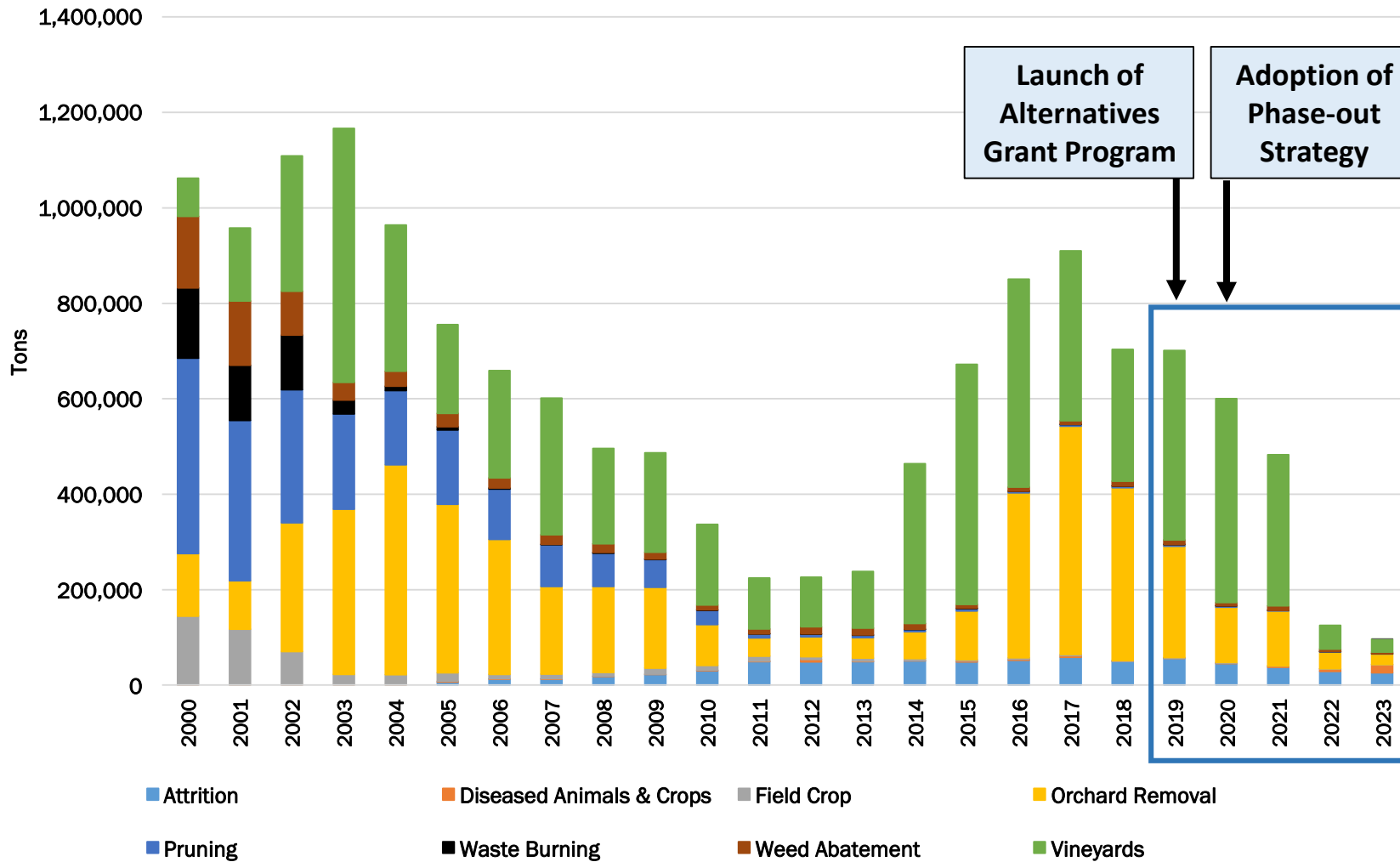
- District facing deadlines for multiple federal air quality standards for ozone and PM2.5, which still require significant emission reductions
 - EPA currently evaluating lowering ozone and PM2.5 standards, which will create additional challenges for the Valley
- Due to air quality challenges, Valley meteorology, topography, burn windows are becoming more infrequent and are closely managed
 - Ongoing wildfire issues also limiting burn windows during the summer and fall seasons
- Burn windows to continue to be closely managed even for crops allowed to be open burned after January 1, 2025 phase-out date (attrition, diseased crops, etc.)

Significant Reductions in Agricultural Open Burning

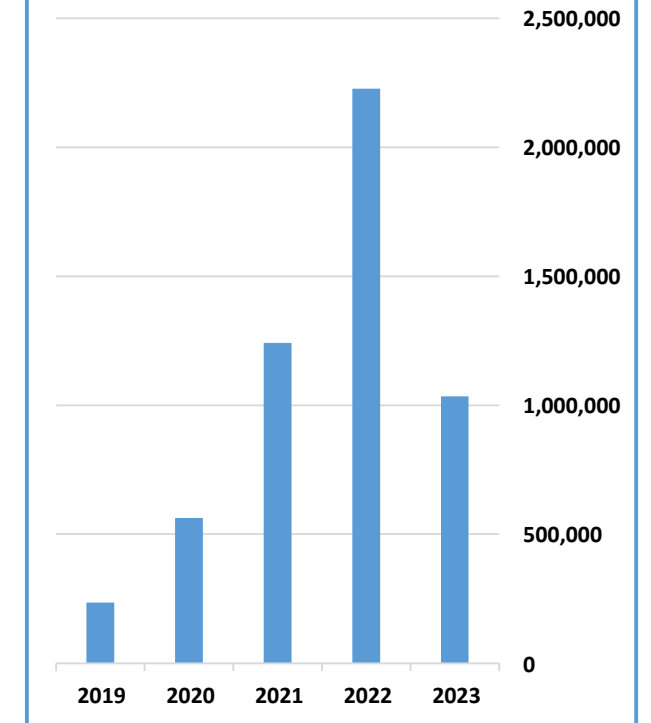
- Through combination of phase-out strategy and Ag Burn Alternatives Grant Program, agricultural open burning has decreased significantly in recent years
 - Over 1,000,000 tons of material open burned annually in past
 - 2021: Approximately 480,000 tons of material open burned
 - 2022: Approximately 125,000 tons of material open burned (new record low for Valley)
 - 2023: Approximately 101,250 tons of material open burned to date
- Expected to continue to decrease in 2024 as the final phase-out continues to be implemented

Agricultural Burning and Grant Program Trends

Tons of Ag Woody Waste Burned



Tons of Ag Woody Waste Processed Through Alternatives



Ongoing Implementation of Phase-out Schedule

Jan 1, 2022	Jan 1, 2023	Jan 1, 2024	Jan 1, 2025
CORDON Prohibit burning at ag operations >2,000 acres	CORDON Prohibit burning at ag operations >1,000 acres	CORDON Prohibit burning at ag operations >250 acres	CORDON Prohibit all vineyard removal open burns
CANE Prohibit burning at ag operations >500 acres	CANE Prohibit burning at ag operations >250 acres	CANE Prohibit burning at ag operations >100 acres	CANE Prohibit all vineyard removal open burns

Vineyard Removals

Jan 1, 2022	Jan 1, 2023	Jan 1, 2024	Jan 1, 2025
Prohibit burning at ag operations >500 acres	Prohibit burning at ag operations >200 acres	Prohibit burning at ag operations >100 acres	Prohibit all orchard removal open burns

Orchard Removals

Jan 1, 2021	Jan 1, 2022	Jan 1, 2023	Jan 1, 2025
Prohibit surface harvested pruning open burns >20 acres	Prohibit open burning ≤20 acres at agricultural operations >200 acres	Lower agricultural operation threshold to >50 acres	Prohibit all pruning open burns

Surface Harvested Prunings


Ag Burn Alternatives Grant Program

- Recognizing need to develop new alternatives, in 2018 District Board authorized development of new Ag Burn Alternatives Grant Program
- Provides financial incentives to growers to chip ag material for soil reincorporation, land application, and off-site beneficial reuse
 - Over \$25 million in local funding invested to support emerging alternatives
- In August 2021, through strong advocacy and program success, District received \$178,200,000 in additional state funding to expand fleet capacity and support deployment of new alternative practices in the Valley



Learn more about the ongoing phase out of agricultural open burning in the San Joaquin Valley. Current regulations require a near complete phase out by January 1, 2025. Significant incentive funding is available to assist farmers in making this transition.

SCAN QR CODE



Scan with cell phone camera for complete details

Incentive Funding is NOW AVAILABLE

CROP TYPE	Chipping with soil incorporation	Chipping without soil incorporation on-site	Chipping with off-site beneficial reuse
Orchards	Up to \$600 per acre	Up to \$300 per acre	Up to \$600 per acre
Cane-pruned vineyard	Up to \$800 per acre	Up to \$500 per acre	Up to \$800 per acre
Cordon-pruned vineyard	Up to \$1,300 per acre	Up to \$1,000 per acre	Up to \$1,300 per acre

ADDITIONAL \$400 PER ACRE FOR SMALL AG OPERATIONS LESS THAN 100 ACRES

Annual Funding Cap: 500 acres of orchard/vineyard removal per applicant per calendar year

Orchard/Vineyard Removal Alternative Measure Funding Options

- Soil Incorporation
 - Chipped material is ripped and/or disced back into orchard/vineyard removal site
- Land Application
 - Chipped material is applied and/or spread over the orchard/vineyard removal site
- Chipped Material for Off-Site Beneficial Re-use
 - Examples include mulch, composting, land application near roadways for dust suppression, or other District-approved use of the chipped material beyond soil incorporation or land application
- Air Curtain Burner
 - Grant funding provided only for projects used to dispose of material with embedded wire, such as cordon (spur) pruned vineyard material

Incentive Amounts (\$/Acre)

Project Type	Orchards	Cane-Pruned Vineyard	Cordon-Pruned Vineyard
Chipping <u>with</u> Soil Incorporation (whole orchard/vineyard recycling)	\$600	\$800	\$1,300
Chipping <u>without</u> Soil Incorporation (on-site land application)	\$300	\$500	\$1,000
Off-site Beneficial Re-use (mulching, composting, land application near roadways for dust suppression)	\$600	\$800	\$1,300
Air Curtain Burner (only for material with embedded wire such as cordon-pruned vineyard)	\$1,000	Ineligible	\$1,000
Additional incentive of \$400/acre is provided for each incentive category to agricultural operations with 100 total acres or less within the San Joaquin Valley			

