



CALIFORNIA
AIR RESOURCES BOARD

Proposed Fiscal Year 2017-18 Funding Plan for Clean Transportation Incentives

**Board Presentation
December 14, 2017**



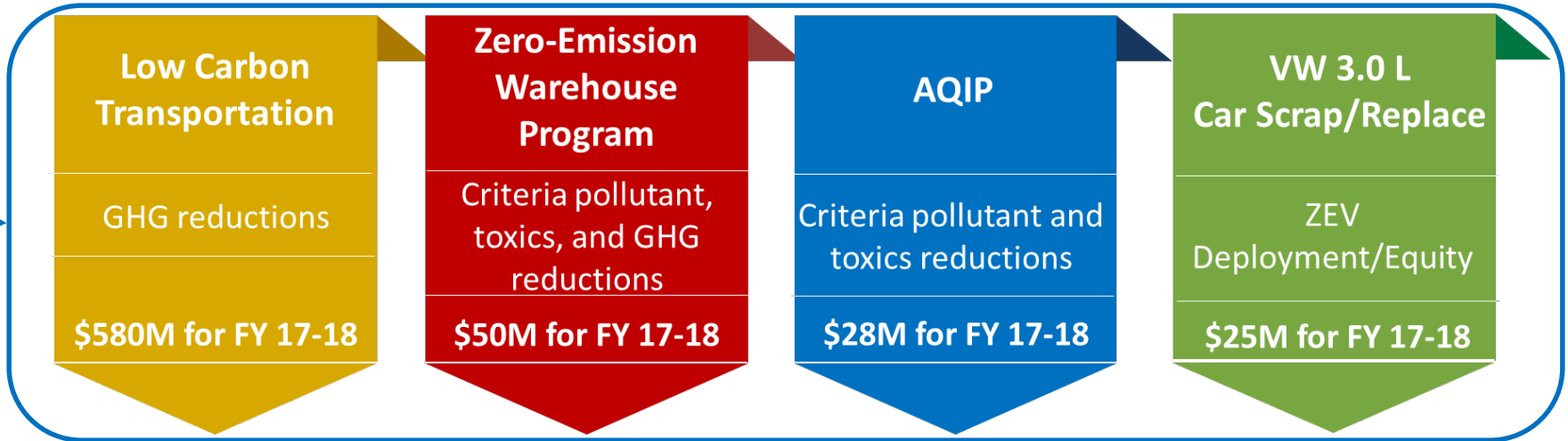
Overview of Presentation

- Overview of CARB's incentive programs
- Funding Plan goals and priorities
- Review of past investments
- Staff's proposal
- Recommendation

CARB Incentive Portfolio

Over \$1.5 Billion for Fiscal Year 2017-18

Today's Proposal



AB 617	Carl Moyer	Prop 1B	Agricultural Incentives	VW Mitigation Trust
Criteria and toxics reductions for community goals	SIP emission reductions	PM and NOx reductions in goods movement corridors	Criteria pollutant, toxics, and GHG reductions	NOx mitigation
\$250M for FY 17-18	\$69M for FY 17-18	\$267M for 2015+	\$135M for FY 17-18	\$423M for 2017+

Programs Have Different, But Related, Goals

- Advance technologies for long-term climate and air quality goals
Low Carbon Transportation, Zero-Emission Warehouse
- Improve access to clean transportation/equity
Low Carbon Transportation, VW Car Scrap/Replace
- Support sustainable freight
Low Carbon Transportation, Zero-Emission Warehouse, Prop 1B, Moyer, AB 617, VW NOx Mitigation, AQIP

Programs Have Different, But Related, Goals

- Turnover legacy fleet

Moyer, AB 617, VW NOx Mitigation, Agricultural Incentives, Prop 1B, AQIP

- Reduce agricultural sector emissions

Agricultural Incentives, Moyer, AB 617

- Invest in disadvantaged communities, low-income communities, and low-income households

All CARB Incentive Programs

Investment Decisions Coordinated Across Programs

- Today's proposal covers primary CARB funding for transformative technologies & transportation equity
 - Demonstration, pilot, early deployment of newest technologies and strategies
 - Includes light-duty vehicle funding
- New Volkswagen NOx Mitigation, AB 617, and Agricultural Incentive Programs
 - Initiated public process, proposals to Board in 2018
 - Primarily heavy-duty/off-road fleet turnover to cleanest commercialized technologies

Fiscal Year 2017-18 Funding Plan

Funding Plan Priorities

**Support Long-Term
Transformation of Fleet
to Zero-Emitting**

**Invest in Disadvantaged
and Low-Income
Communities**

**Build on Investments
from Past Funding Plans**

**Implement SB 350
Recommendations**

**Improve Access to
Clean Transportation**

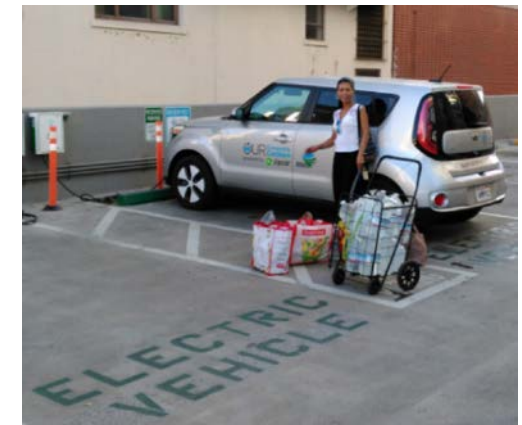
Funding Plan Builds on Previous Investments

- Over 200,000 CVRP rebates
- Over 4 percent of California new car sales
- 15 percent of funds now go to low-income applicants
- Rebate Now prequalification to launch in January



Funding Plan Builds on Previous Investments

- Over 2,000 cars scrapped and replaced
- Car share launched in Sacramento
- Statewide low-income consumer financing assistance launching 2018



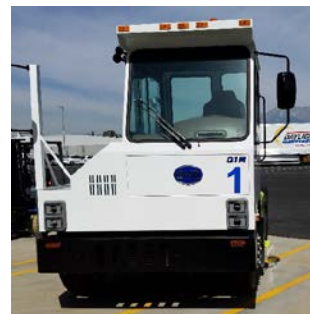
Funding Plan Builds on Previous Investments

- 4,000+ HVIP/low NOx vouchers
- Over 1,000 participating fleets
- Over 20 manufacturers and 60 eligible models
- 2 Class 8 electric trucks now eligible



Funding Plan Builds on Previous Investments

- 30 school buses for rural school districts
- 150 zero-emission trucks and buses in disadvantaged communities
- Drayage truck and freight equipment demonstrations



A Closer Look at Each Funding Source Covered in Plan...

\$660+ Million in Clean Transportation Incentives Covered in Funding Plan

\$560 million	Low Carbon Transportation Program funded with Cap-and-Trade Auction Proceeds
\$28 million	Air Quality Improvement Program (AQIP)
\$25 million	Volkswagen Settlement for ZEV Aspects of Vehicle Replacement Programs
\$50 million	Zero/Near Zero-Emission Warehouse Program

\$560 Million Low Carbon Transportation Appropriation



- Legislature allocated funding to four categories
- \$140 million for CVRP
 - Continues income limits set by Legislature
 - Directs CARB to work with Labor and Workforce Development Agency
- \$100 million for transportation equity projects
 - Car scrap and replace, school bus replacement, low-income CVRP rebates, and other equity projects

Low Carbon Transportation Appropriation (cont.)



- \$180 million for HVIP clean truck and bus vouchers
 - Directs CARB to consider forthcoming technological innovations and market demand in designing program
 - Reserves at least \$35 million for zero-emission buses
- \$140 million for advanced freight equipment demonstration and development
 - Includes ships at berth
 - Prohibits funding fully automated cargo handling equipment

AQIP

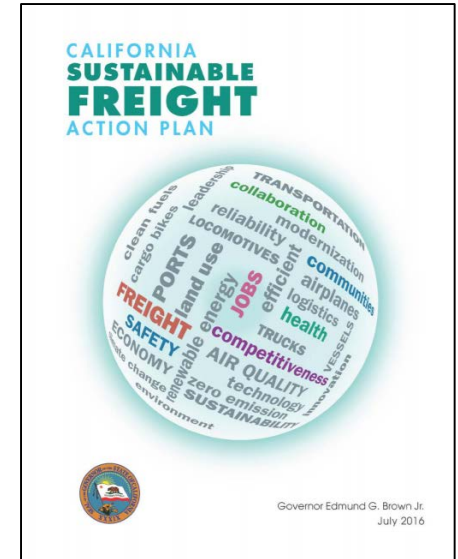
- \$28.64 million for criteria pollutant and toxics focused mobile source projects
- Focuses on projects that don't fit under Low Carbon Transportation
 - Truck Loan Assistance

Volkswagen Settlement Funds for ZEV Car Replacement

- \$25 million for ZEV-related aspects of vehicle replacement for low-income households
 - Part of California-only Volkswagen 3.0 liter consent decree
- Legislature provided additional direction in budget
 - Support expansion of EFMP Plus-up statewide
 - Develop tool to improve efficiency and verify eligibility
 - Increase community outreach

Zero/Near Zero-Emission Warehouse Program

- One-time \$50 million appropriation, with following direction
 - Award funding competitively with one-to-one match
- Coordinating with Low Carbon Transportation freight funding



Staff's Proposal

Proposed Project Allocations: Light-Duty Vehicles and Transportation Equity

Project Category	Allocation (millions)
CVRP (standard rebates)	\$140
Transportation Equity Projects	
EFMP Plus-Up/Clean Cars 4 All (car scrap and replace)	\$20
Financing Assistance	\$20
Car Sharing and Agricultural Worker Vanpools	\$25
Rural School Bus Pilot	\$10
CVRP Rebates for Low-Income Applicants	\$25
One-Stop-Shop for Equity ZEV Incentives <i>(new)</i>	\$5
To Be Allocated Based on Demand	\$20
TOTAL	\$265

Highlights of Light-Duty Vehicle and Transportation Equity Proposal

- Meet anticipated CVRP demand
 - Ensure continuous funding for low-income applicants
- Grow existing transportation equity projects
- Use \$25 million CA-only Volkswagen settlement funds to expand reach of car scrap and replace
- Make incentives easier to access (SB 350 study)
 - One-stop-shop
 - Increased community level outreach
 - New car share model will help smaller communities

Proposed Project Allocations: Heavy-Duty Vehicles and Off-Road Equipment

Project Category	Allocation (millions)
Clean Truck and Bus Vouchers (HVIP and Low NOx Engines)	\$188
Advanced Freight Equipment and Facilities	
Zero/Near Zero-Emission Freight Facilities (incl warehouses) <i>(new)</i>	\$150
Zero-Emission Off-Road Freight Voucher Incentive Project <i>(new)</i>	\$40
Truck Loan Assistance Program	\$20
TOTAL	\$398

Highlights of HVIP Proposal

- Meet anticipated demand for all technologies (zero-emission, hybrid, low NOx)
 - Considered new engines coming to market
 - Should bridge budget years with no waitlist
- Revise some voucher amounts to better reflect incremental cost
- Add infrastructure vouchers for HVIP funded zero-emission trucks and buses

Highlights of Freight Proposal



- \$40 million: statewide voucher project for early commercial zero-emission freight equipment deployment
- \$150 million: larger-scale transformative freight facility projects
 - Reduce emissions from multiple operations and equipment types at a facility
 - Showcase potential for widespread commercialization of zero/near zero-emission vehicles and equipment
 - Focus on disadvantaged communities

3 Year Investment Strategy for Heavy-Duty Vehicles & Off-Road Equipment

- Funding Plan includes three-year “roadmap” for heavy-duty technology investments
 - Complements 3-year light-duty investment strategy in last year’s Funding Plan
- Assesses technology pathways, market readiness
 - Metrics for success and recommendations to ensure progress toward 2030 and later goals
- 3-year investment strategy communicates multi-year vision and funding need

AB 1550 Disadvantaged Community and Low-Income Investments

- AB 1550 requires auction proceeds investments in disadvantaged and low-income communities and low-income households
- Designing projects to maximize AB 1550 benefits and exceed targets
- Designing non-GGRF programs to benefit AB 1550 populations as well

Proposed Modifications to Funding Plan

- Reallocation of \$5 million in 2016-17 funding
 - From off-road freight equipment pilot to oversubscribed Rural School Bus Pilot Program
- Program administration
 - Still finalizing procedures to implement budget direction on advance payment of grants

Conclusion and Recommendation

Summary of Staff's Proposal

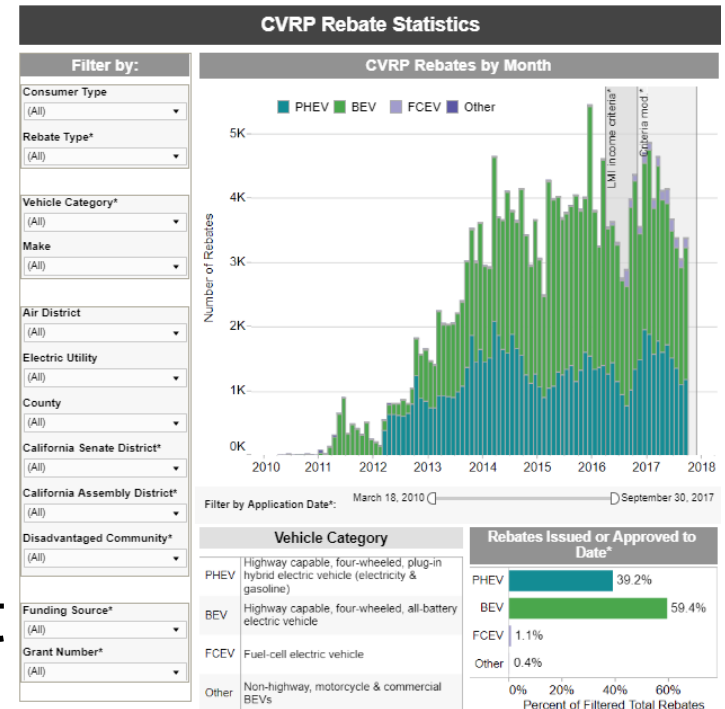
- Accelerates commercialization of zero-emission technologies to meet climate and air quality goals
 - Significant increase for transformative freight funding
- Expands rebate and voucher projects to meet consumer and fleet demand
- Expands disadvantaged community and low-income projects
 - Increase community outreach

Proposed Investments Support Multiple Policy Goals

Project Categories	Climate Change Scoping Plan	Short-Lived Climate Pollutants	Ozone & PM SIPs	Sustainable Freight	Air Toxics	Petroleum Reduction	Disadvantaged/Low Income Communities
ZEV Passenger Car Rebates (CVRP)	✓	✓	✓		✓	✓	✓
Transportation Equity Projects	✓	✓	✓		✓	✓	✓
Advanced Freight Equipment	✓	✓	✓	✓	✓	✓	✓
Clean Truck and Bus Vouchers (HVIP)	✓	✓	✓	✓	✓	✓	✓
Truck Loan Assistance	✓	✓	✓	✓	✓		✓

Transparency and Tracking Progress

- Implementation updates to Board and public in annual Funding Plans
- Annual reports to Legislature
- Continuously updated project statistics on CVRP and HVIP websites



Recommendation

- Approve proposed Funding Plan with staff's modifications

