

**AB 118: Air Quality
Improvement Program
(AQIP)**

Public Workshop
Sacramento, CA
April 4, 2013

CALIFORNIA ENVIRONMENTAL PROTECTION AGENCY
 Air Resources Board

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Presentation Outline

- Overview of AQIP
- Update on AQIP implementation
- Proposed FY 2013-14 AQIP Funding Plan
- Closing comments

*Handouts available online at:
<http://www.arb.ca.gov/msprog/aqip/meetings/fy2013-14.htm>*

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Overview of AQIP

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AQIP Background

- Created by Assembly Bill 118 (2007)

<p style="text-align: center;">ARB Air Quality Improvement Program (AQIP) \$35 million Criteria pollutants, toxics, and GHGs</p>	<p style="text-align: center;">CEC Alternative and Renewable Fuel and Vehicle Technology Program \$100 million GHGs</p>	<p style="text-align: center;">BAR Enhanced Fleet Modernization Program \$30 million Criteria pollutants, toxics, and GHGs</p>
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- Revenue sources sunset in 2015

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AQIP Funding Plan

- Staff develops proposed plan reflecting:
 - Public input
 - Guiding principles
 - Current ARB priorities
 - Coordination with CEC AB 118 program
- Plan establishes project categories, funding targets, contingency provisions
- Board approves Funding Plan

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Approved Guiding Principles

- Focus on longer-term, post-2020 SIP goals
- Prioritize underfunded project types
- Investments in two project types:
 - Vehicle/equipment deployment
 - Demonstration of technologies near commercialization

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Implementation Update

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Project Funding FY's 2009-2013

Project	FYs 2009-13
Clean Vehicle Rebates	\$55.8M
Hybrid and Zero Emission Truck & Bus Vouchers	\$54.4M
Advanced Demonstrations and Hybrid Truck Testing	\$7.3M
Lawn & Garden Equip. Replacement (FY 2009-11)	\$2.6M
Off-Road Hybrid Pilot (FY 2010-11)	\$2M
Zero-Emission Agricultural Work Vehicles (FY 2009-10)	\$0.1M
Total Funding	~\$122M*

*Includes \$10.5M from CEC for zero-emission trucks and clean vehicles

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Clean Vehicle Rebate Project (CVRP)

- Rebates for CA consumers
 - \$2,500 for ZEVs
 - \$1,500 for Plug-in Hybrid Vehicles
- Administered by the California Center for Sustainable Energy
- Accelerate deployment of the cleanest vehicles available
- Demand for funding continues to grow

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CVRP Rebates Issued to Date *(as of March 11, 2013)*

Vehicle Type	# Vehicles	Funds Spent
Zero Emission Vehicles (ZEVs)	10,036	\$29,123,238
Plug-in Hybrid Electric Vehicles (PHEVs)	9,234	\$13,835,250
Zero Emission Motorcycles (ZEMs)	137	\$149,500
Neighborhood Electric Vehicles (NEVs)	91	\$100,750
Commercial ZEVs*	49	\$980,000
Total	19,547	~\$44M

*Part of HVIP as of FY 10-11

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CVRP Vehicle Diversity

Vehicle Type	# Eligible Vehicle Makes
Zero Emission Vehicles (ZEVs)	17
Plug-in Hybrid Electric Vehicles (PHEVs)	5
Zero Emission Motorcycles (ZEMs)	7
Neighborhood Electric Vehicles (NEVs)	4
Total	33

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Hybrid and Zero Emission Truck & Bus Voucher Incentive Project (HVIP)

- Consumer vouchers for about ½ incremental cost
- Administered by CALSTART
- Prior program changes spurring increased interest

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HVIP Vouchers Issued (through March 1, 2013)

Vehicle Vocation	# Vehicles	Funds Spent
Beverage Delivery	401	\$13,335,000
Parcel Delivery	387	\$11,226,000
Food Distribution	155	\$5,455,000
Other Truck	138	\$2,614,000
Uniform and Linen Delivery	118	\$3,245,000
School , Shuttle or Urban Bus	29	\$871,776
LP Pick-up & Delivery	22	\$570,000
Refuse Hauler	13	\$470,000
TOTAL	1,263	~\$38M

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Advanced Technology Demonstrations

- 13 projects ongoing; 1 new
 - 4 locomotives
 - 3 marine vessels
 - 3 commercial lawn and garden equipment
 - 2 zero-emission school buses
 - *new* electric yard trucks
- Hybrid truck testing
- FY 2012-13; \$1 million for Zero-Emission Transit

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Status of Other AQIP Projects

Project	FY's 2009-11
Lawn & Garden Equip. Replacement	12,000 mowers replaced
Zero-Emission Ag Utility Vehicles	Project closed; 56 rebates issued
Off-Road Hybrid Pilot	16 vouchers issued; project ends June 2013

Note: these projects were not funded in FY 2011-12, or FY 12-13.

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Truck Loans FY 2008-09 AQIP Funds	
<ul style="list-style-type: none">• ~\$30M allocated to truck loans• Loan assistance program (PLACE) ongoing• About 2,200 loans issued; 2,600 clean trucks• About \$148 million in financing provided• For more information and participating lender list: http://www.arb.ca.gov/ba/loan/on-road/on-road.htm	

Status of CEC AB 118 Program	
<ul style="list-style-type: none">• Complements ARB AQIP projects• More than \$350 million invested• Related projects<ul style="list-style-type: none">– charging infrastructure– ZEV advanced truck technology demonstrations– alt. fuel vehicles– EV-related battery, component and vehicle manufacturing• Ongoing solicitations• Plan approval expected early May• Strong partnership between agencies	

Proposed FY 2013-14 Funding Plan	
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Funding for FY 2013-14 AQIP Projects

- Funding demand greatly outweighs revenue
 - \$35M authorized in Governor's Proposed Budget
 - Expected revenues of ~\$25M for projects
- Program operates month-to-month
- Project solicitation timing critical

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Proposed Project Categories

- CVRP
- HVIP
- Advanced Technology Demonstration Projects
- Truck Loan Assistance Program

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Clean Vehicle Rebate Project

The chart displays the monthly number of rebates from March 2010 to March 2013. The y-axis represents the 'Number of Rebates' from 0 to 2000. The x-axis shows months from Mar-10 to Mar-13. The bars are stacked with ZEVs at the bottom, PHEVs in the middle, and OTHER at the top. There is a significant increase in rebates starting in late 2011, peaking in late 2012.

Month	ZEVs	PHEVs	OTHER
Mar-10	0	0	0
Apr-10	0	0	0
May-10	0	0	0
Jun-10	0	0	0
Jul-10	0	0	0
Aug-10	0	0	0
Sep-10	0	0	0
Oct-10	0	0	0
Nov-10	0	0	0
Dec-10	0	0	0
Jan-11	0	0	0
Feb-11	0	0	0
Mar-11	0	0	0
Apr-11	0	0	0
May-11	0	0	0
Jun-11	0	0	0
Jul-11	0	0	0
Aug-11	0	0	0
Sep-11	0	0	0
Oct-11	0	0	0
Nov-11	0	0	0
Dec-11	0	0	0
Jan-12	0	0	0
Feb-12	0	0	0
Mar-12	0	0	0
Apr-12	0	0	0
May-12	0	0	0
Jun-12	0	0	0
Jul-12	0	0	0
Aug-12	0	0	0
Sep-12	0	0	0
Oct-12	0	0	0
Nov-12	0	0	0
Dec-12	0	0	0
Jan-13	0	0	0
Feb-13	0	0	0
Mar-13	0	0	0

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Clean Vehicle Rebate Project: Discussion Concepts

- Consumer eligibility
 - Income based
 - Geography based
- Vehicle eligibility
 - Set a price cap
 - Allow only certain vehicle types
- Evaluate rebate amounts
 - Maintain rebate amounts for pure ZEVs only
- Standardize rebate amounts

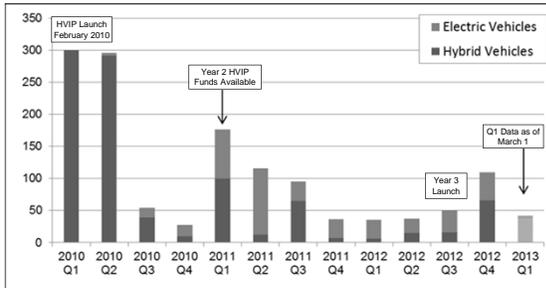
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Clean Vehicle Rebate Project: Concepts Cont.

- Enhance public fleet participation
 - Allow for a set aside
 - Increase rebate amounts
- Evaluate ownership requirements
 - Reduce or eliminate 3 year requirement
 - Alternative options
- Other concepts?

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Hybrid and Zero Emission Truck & Bus Voucher Incentive Project



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Hybrid and Zero Emission Truck & Bus Voucher Incentive Project: Concepts
<ul style="list-style-type: none">• Prop 1B set-aside• Battery-Electric vouchers based on battery capacity• Higher voucher amount for fast charge• Voucher enhancement for first three vouchers applies only once
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Hybrid and Zero Emission Truck & Bus Voucher Incentive Project: Concepts Cont.
<ul style="list-style-type: none">• Update assumed incremental cost for hybrids• Stronger 3-year warranty• Enhanced voucher for extended warranties• Other concepts?
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Advanced Technology Demonstration Projects
<ul style="list-style-type: none">• Vision outlines need for early investments in Advanced Technology Demonstrations• Historical investments vs. need<ul style="list-style-type: none">– \$5.6M invested to date– \$10M per year needed
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**Advanced Technology Demonstration
Projects: Concept Categories**

- Zero-Emission Transit Bus (from FY 12-13 funds)
- Multiple Locomotive Diesel Particulate Filter Demonstration
- Tier-4 Locomotives
- Hybrid and Other Advanced Locomotive Technologies
- Marine Vessel Hybridization
- Advanced Ferries

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**Advanced Technology Demonstration
Projects: Concept Categories**

- Ground Support Equipment
- Advanced Freight Transport
- Advanced Distribution Center Equipment
- Advanced Off-road Equipment
- School Buses
- Others?

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Truck Loan Assistance Program

- Up to \$4M allocated in March from HVIP
- Another \$4M needed for CY 2013
- Over \$19M needed for CY 2014
 - ~\$10M through end of FY 2013-14
- Program remains with CPCFA

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AQIP Development Schedule	
Milestone	Date
Workgroup Meetings for core AQIP Projects	April 2013
Release proposed FY 2013-14 AQIP Funding Plan	May 2013
Board Hearing	June 2013
FY 2013-14 project solicitations	Begin Summer 2013

Information Sources
<p>AQIP website www.arb.ca.gov/msprog/aqip/aqip.htm</p> <p>CEC AB 118 website www.energy.ca.gov/altfuels/index.html</p> <p>BAR website www.smogcheck.ca.gov</p>

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Comments and Discussion

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