

### Air Pollution Control Board

Greg Cox District 1
Dianne Jacob District 2
Pam Slater-Price District 3
Ron Roberts District 4
Bill Horn District 5

### **COMPLIANCE ADVISORY**

### AIRBORNE TOXIC CONTROL MEASURE (ATCM) FOR PORTABLE DIESEL-FUELED ENGINES

On February 26, 2004, CARB adopted the Airborne Toxic Control Measure (ATCM) for Diesel Particulate Matter from Portable Engines Rated at 50 Horsepower and Greater (Section 93116, Title 17, California Code of Regulations). This regulation is specifically designed to reduce particulate emissions from portable diesel-fueled engines. The ATCM became effective on March 11, 2005. The San Diego County Air Pollution Control District (District) will now begin implementing all aspects of the ATCM.

Existing regulations require portable diesel-fueled engines greater than 50 brake horsepower (bhp) to have either a State registration or a District Permit to Operate. The ATCM requires that after January 1, 2006, any portable engine (new or pre-existing) being permitted or registered must meet the most stringent Tier emission standards in effect at the time of registration or permitting. Additionally, CARB's Statewide Portable Equipment Registration Program (PERP) was recently amended (see attached summary) to allow previously ineligible (uncertified) portable engines to be able to register in the PERP if they qualify as a resident engine (i.e., one which resided in California at any time during the period of July 1, 2003, to July 1, 2004). However, this option will only be effective until December 31, 2005.

The new ATCM includes the following:

**Applicability** 

All portable diesel-fueled engines having a maximum rated horsepower of 50 brake horsepower (bhp) and greater, including auxiliary engines on mobile equipment.

### **All Requirements** of any kind.

**Exemptions From** Any engine used to propel mobile equipment or a motor vehicle

Any portable engine using an alternative fuel (i.e., gasoline, natural gas, propane, liquid petroleum gas, hydrogen, ethanol, or methanol).

Dual-fuel diesel pilot engines that use an alternative fuel or an alternative diesel fuel.

Military tactical support equipment.

New agricultural or construction engines less than 175 bhp.

Portable diesel-fueled engines operated at airports that satisfy certain requirements.

#### Requirements

Existing regulations require portable diesel-fueled engines greater than 50 bhp to have either a State registration or a District Permit to Operate. The ATCM requires that after January 1, 2006, any portable engine (new or pre-existing) being permitted or registered must meet the most stringent Tier emission standards in effect at the time of registration or permitting (i.e., Tier 2, Tier 3, or Tier  $4)^1$ . Prior to January 1, 2006, non-tiered engines may be registered or permitted.

All portable diesel-fueled engines are required to use CARB diesel fuel, a verified alternative diesel fuel, or CARB diesel with verified fuel additives.

By January 1, 2010, portable diesel-fueled engines permitted or registered before January 1, 2006, are required to be certified to meet Tier 1, Tier 2, or Tier 3 diesel nonroad engine emission standards. This does not apply to emergency engines, low-use engines (operating less than 80 hours per calendar year), or, with State or District approval, lattice boom crane engines.

By January 1, 2010, emergency or low-use portable diesel-fueled engines permitted or registered before January 1, 2006, are required to be certified to meet Tier 1, Tier 2, or Tier 3 diesel nonroad engine emission standards. Alternatively, the engine may be replaced by a certified Tier 4 engine within two years of the availability of such engines in the marketplace.

continued

### **Requirements** continued

Beginning January 1, 2013, one or more portable diesel-fueled engines under common ownership, excluding emergency and other specified engines, are required to meet fleet average diesel particulate matter emission standards. Successively more stringent fleet average emission standards become effective in 2017 and 2020.

Beginning January 1, 2020, all portable diesel-fueled emergency engines, low-use engines, and previously exempt lattice boom crane engines are required to be certified to meet Tier 4 emission standards or have a verified emission control strategy that achieves 85% or more reduction in diesel particulate matter.

<sup>1</sup> Tier 1, 2, 3, and 4 refer to nonroad engine emission standards promulgated by ARB and U.S. EPA for newly manufactured engines pursuant to 40 CFR Part 89 or Title 13 of the California Code of Regulation. Each successive Tier represents more stringent emission standards and the requirements are phased-in over time with the Tier 1 engine standards becoming effective for some engines manufactured in 1996 and becoming effective for all engines by 2000. Tier 2 engine standards are phased in for engines manufactured beginning in 2001 and becomes effective for all engines by 2006. Similarly, Tier 3 engines are phased in for engines manufactured beginning in 2011.

### Recordkeeping Requirements

Requires specified records be kept, for certain types of engines that adjust the fleet average emission standard and certain engines excluded from the fleet average emission standard. The recordkeeping begins January 1, 2012, for most engines. However, engines using alternative fuels that are added to a fleet prior to January 1, 2009, must begin keeping records by January 1, 2008.

### Monitoring Equipment

Requires installation of non-resettable hour meters on all engines subject to recordkeeping by the ATCM. The hour meter must be installed by January 1, 2012, for most engines and by January 1, 2008, for engines using an alternative fuel that are added to a fleet before January 1, 2009.

### Reporting Requirements

Requires specified compliance reports be submitted beginning March 1, 2011.

Copies of the ATCM may be obtained from the Air Resources Board website at http://www.arb.ca.gov/regact/porteng/fro.pdf. If you have any questions concerning the ATCM, please contact Jorge Lopez at (858) 650-4551 or (858) 586-2682 (effective November 7, 2005) or via e-mail at Jorge.Lopez@sdcounty.ca.gov, Cara Bandera at (858) 650-4592 or (858) 586-2751 (effective November 7, 2005) or via e-mail at Cara.Bandera@sdcounty.ca.gov, or Steve Moore at (858) 650-4598 or (858) 586-2750 (effective November 7, 2005) or via e-mail at Steve.Moore@sdcounty.ca.gov.

JL:ls 10/27/05



#### **Air Pollution Control Board**

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December 23, 2005

### **COMPLIANCE ADVISORY**

### SECOND NOTICE OF THE DECEMBER 31, 2005 DEADLINE FOR REGISTERING EXISTING PORTABLE DIESEL-FUELED ENGINES GREATER THAN 50 BHP THAT ARE NOT CURRENTLY REGISTERED OR PERMITTED

On February 26, 2004, California Air Resources Board (CARB) adopted the Airborne Toxic Control Measure (ATCM) for Diesel Particulate Matter from Portable Engines Rated at 50 Horsepower and Greater (§93116, Title 17, California Code of Regulations). The ATCM became effective on March 11, 2005.

One of the ATCM requirements is that existing portable engines that are **NOT** currently permitted or registered with CARB or a local district must do so by **December 31, 2005**. Additionally, CARB's Statewide Portable Equipment Registration Program (PERP) was amended to allow previously ineligible (uncertified) portable engines to be able to register in the PERP if they qualify as a resident engine (i.e., one that resided in California at any time during the period of July 1, 2003 to July 1, 2004). **However, this will only be an option until December 31, 2005**. **After that date, any portable engine not currently permitted or registered with the state or district must meet the most stringent emission standards in effect at the time of registration or permitting.** This will likely mean the purchase of a new engine to comply with the ATCM.

Engines may be registered in either the statewide PERP or the District's local registration program (Rule 12.1) or permitted with the District. Engines registered in the PERP may operate throughout California. Additional information and forms for the statewide PERP may be obtained from the ARB website at <a href="https://www.arb.ca.gov/portable/perp/perp.htm">www.arb.ca.gov/portable/perp/perp.htm</a>. Please be aware that not all portable engines qualify for the District's registration program or for permitting by the District. However, all portable resident engines will qualify for the statewide PERP. Additional information and forms for the District's portable equipment registration program may be obtained from the District website at <a href="www.sdapcd.org/permits">www.sdapcd.org/permits</a>. Application forms and appropriate fees must be postmarked by December 31, 2005, for acceptance as existing engines to either ARB or the District portable equipment programs.

Copies of the ATCM may be obtained from the ARB website at <a href="www.arb.ca.gov/regact/porteng/fro.pdf">www.arb.ca.gov/regact/porteng/fro.pdf</a>. The District is open to the public by appointment only December 26, 2005 through December 30, 2005. For assistance or questions, contact Scott Underhill at (858) 586-2653, Steven Moore at (858) 586-2750, or Evariste Haury at (858) 586-2745. The District will be closed December 31, 2005 through January 2, 2006. Further information regarding the state programs may be obtained by contacting the Statewide Portable Equipment Registration Information Line at (916) 324-5869.

SM:CB:ap

### California Air Resources Board (ARB) Off-Road Compression Ignition Engine Standards – g/bhp-hr (g/kwh)

Engine Power	Tier	Year	СО	НС	NMHC + NOx	NOx	PM
hp < 11	Tier 1	2000	6.0 (8.0)	-	7.8 (10.5)	-	0.75 (1.0)
(kW < 8)	Tier 2	2005	6.0 (8.0)	-	5.6 (7.5)	-	0.6 (0.8)
	Tier 4	2008	6.0 (8.0)	-	5.6 (7.5)	-	0.3 (0.4)
11 ≤ hp < 25	Tier 1	2000	4.9 (6.6)	-	7.1 (9.5)	-	0.6 (0.8)
$(8 \le kW < 19)$	Tier 2	2005	4.9 (6.6)	-	5.6 (7.5)	-	0.6 (0.8)
	Tier 4	2008	4.9 (6.6)	-	5.6 (7.5)	-	0.3 (0.4)
$25 \le hp < 50$	Tier 1	2000	4.1 (5.5)	-	7.1 (9.5)	-	0.6 (0.8)
$(19 \le kW \ 37)$	Tier 2	2004	4.1 (5.5)	-	5.6 (7.5)	-	0.45 (0.6)
	Tier 4	2008	4.1 (5.5)	-	5.6 (7.5)	-	0.22 (0.3)
		2013	4.1 (5.5)	-	3.5 (4.7)	-	0.022 (0.03)
$50 \le hp < 100$	Tier 1	2000	-	-	-	6.9 (9.2)	-
$(37 \le kW < 75)$	Tier 2	2004	3.7 (5.0)	-	5.6 (7.5)	-	0.3 (0.4)
	Tier 3	2008	3.7 (5.0)	-	3.5 (4.7)	-	0.3 (0.4)
$50 \le hp < 75$	Tier 4	2008	3.7 (5.0)	-	3.5 (4.7)	-	0.22 (0.3)
$(37 \le kW < 56)$		2013	3.7 (5.0)	-	3.5 (4.7)	-	0.022 (0.03)
$100 \le hp < 175$	Tier 1	2000	-	-	-	6.9 (9.2)	-
$(75 \le kW < 130)$	Tier 2	2003	3.7 (5.0)	-	4.9 (6.6)	-	0.22 (0.3)
	Tier 3	2007	3.7 (5.0)	-	3.0 (4.0)	-	0.22 (0.3)
$75 \le hp < 175$	Tier 4	2012	3.7 (5.0)	0.14	-	0.3 (0.4)	0.015 (0.02)
$(56 \le kW < 130)$				(0.19)			, ,
$175 \le hp < 300$	Tier 1	1996	8.5 (11.4)	1.0 (1.3)	-	6.9 (9.2)	0.4 (0.54)
$(130 \le kW < 225)$	Tier 2	2003	2.6 (3.5)	-	4.9 (6.6)	-	0.15 (0.2)
	Tier 3	2006	2.6 (3.5)	-	3.0 (4.0)	-	0.15 (0.2)
$300 \le hp < 600$	Tier 1	1996	8.5 (11.4)	1.0 (1.3)	-	6.9 (9.2)	0.4 (0.54)
$(225 \le kW < 450)$	Tier 2	2001	2.6 (3.5)	-	4.8 (6.4)	-	0.15 (0.2)
	Tier 3	2006	2.6 (3.5)	-	3.0 (4.0)	-	0.15 (0.2)
$600 \le hp < 750$	Tier 1	1996	8.5 (11.4)	1.0 (1.3)	-	6.9 (9.2)	0.4 (0.54)
$(450 \le kW < 560)$	Tier 2	2002	2.6 (3.5)	-	4.8 (6.4)	-	0.15 (0.2)
	Tier 3	2006	2.6 (3.5)	-	3.0 (4.0)	-	0.15 (0.2)
$175 \le hp < 750$	Tier 4	2011-	2.6 (3.5)	0.14	-	0.3 (0.4)	0.015 (0.02)
$(130 \le kW < 560)$		2014		(0.19)			
$hp \ge 750$	Tier 1	2000	8.5 (11.4)	1.0 (1.3)	-	6.9 (9.2)	0.4 (0.54)
$(kW \ge 560)$	Tier 2	2006	2.6 (3.5)	-	4.8 (6.4)	-	0.15 (0.2)
hp ≥ 750	Tier 4	2011-	2.6 (3.5)	-	0.3 (0.4)	0.5 (0.67)	0.07 (0.1)
(kW ≥560)		2014					
generator sets		2015	2.6 (3.5)	-	0.14(0.19)	0.5 (0.67)	0.022 (0.03)
hp ≥ 750	Tier 4	2011-	2.6 (3.5)	-	0.3 (0.4)	2.6 (3.5)	0.07 (0.1)
$(kW \ge 560)$		2014					
all other engines	6 1	2015	2.6 (3.5)	-	0.14(0.19)	2.6 (3.5)	0.03 (0.04)

<sup>1 –</sup> The standards are for carbon monoxide (CO), hydrocarbons (HC), non-methane hydrocarbons, (NMHC), nitrogen oxides (NOx), and particulate matter (PM) expressed in units of grams per brake horsepower per hour (g/bhp-hr) and grams per kilowatt per hour (g/kw-hr).

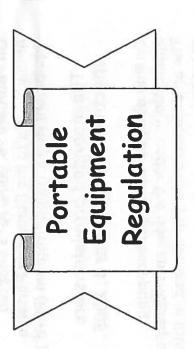
<sup>2 –</sup> Power is maximum rated power expressed in horsepower (hp) or kilowatts (kw).

# HOW TO APPLY TO PERP:

- Obtain application forms and other information at www.arb.ca.gov/perp/perp.htm
- Complete forms and supply all requested information
- Calculate the fees and enclose your payment
- Send to: ARB / PERP P.O. Box 2038 1001 | Street Sacramento, CA 95812
- 5) If you need help, call: (916) 324-5869 or e-mail portable@arb.ca.gov

## REGULATIONS:

For the text of the PERP regulation, visit: www.arb.ca.gov/regact/portreg/portreg.pdf



California Air Resources Board

PERP

P.O. Box 2038

Sacramento, CA 95812

### STATEWIDE PORTABLE EQUIPMENT REGISTRATION PROGRAM (PERP) CHANGES

California Environmental Protection Agency

**⊘** Air Resources Board

## INTRODUCTION

On February 26, 2004, ARB adopted Amendments to the Statewide Portable Equipment Registration Program (PERP).

The amended provisions are effective on September 1, 2005.

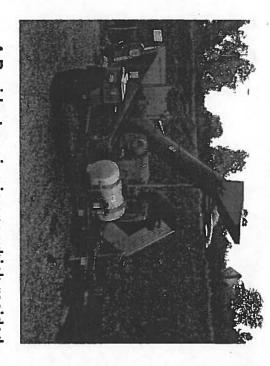
On this date, we will begin accepting applications under the new amendments. The amendments are summarized in this pamphlet.

## **Applicability**

- PERP-registered generators may not provide power to the electric utility grid, stationary sources, or stationary equipment except during:
- an unforeseen loss of power
- maintenance and repair operations
- electrical upgrade operations
- operations where specific frequency or current requirements are not available remote operations
- Equipment units and <u>associated</u>
  <u>engines</u> that are part of a permitted
  stationary source are ineligible
- Any unit losing its PERP eligibility has 90 days to apply for a district permit upon notification

## Requirements

Until December 31, 2005 an uncertified engine can register in PERP only if it qualifies as a resident engine



- A Resident engine is one which resided in California at any time during the period of July 1, 2003 to July 1, 2004
- After December 31, 2005, only certified engines meeting the most stringent offroad standards can apply
- Reminder: After January 1, 2010, portable diesel-fueled engines registered in the program must be certified engines

### **Fees**

- New Registration Fees
- \$270 for a 3-year registration
- Renewal Fees
- \$225 for a 3-year renewal
- New Program Participants pay an additional \$100 per unit until December 31, 2005
- Administrative fees, such as change of ownership, sticker replacements, and modifications, have increased -- for details, go to:

www.arb.ca.gov/perp/perp.htm

## Recordkeeping

- Annual reports no longer need to be submitted to ARB
- Daily records must be maintained for five years and be available upon request
- Fuel meters are required for all newly registered resident engines that are required to maintain daily records of fuel use

Note: certified engines are not required to maintain daily records

## Miscellaneous Changes

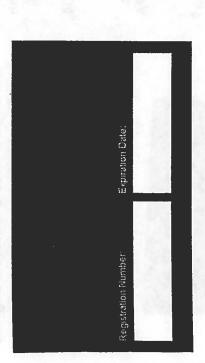
- Identical replacement will be allowed for mechanical breakdown only
- Non-operational registrations must be converted to "operational", or the registration will be cancelled
- A five-year renewal cycle option has been added

For more information on PERP, contact Mike Guzzetta at (916) 322-6025 or via e-mail at mguzzett@arb.ca.gov.



## HOW DO I APPLY FOR A **REGISTRATION?**

- Obtain application forms and other www.arb.ca.gov/perp/perp.htm information at:
- 2) Complete forms thoroughly.
- Calculate the fees and enclose your payment.
- Sacramento, CA 95812 P.O. Box 2038 1001 I Street ARB / PERP 4) Send to:
- 5) If you need help, call: (916) 324-5869 or e-mail portable@arb.ca.gov



STATEWIDE PORTABLE EQUIPMENT REGISTRATION REGULATION:

For the text of the PERP regulation, visit: www.arb.ca.gov/regact/portreg/portreg.pdf

contact Mike Guzzetta: (916) 322-6025 or via e-mail at mguzzett@arb.ca.gov For more information on PERP,

### Portable Engines and **Equipment Units** Registration and Permitting of

California Air Resources Board

PERP

P.O. Box 2038

Sacramento, CA 95812



# What You Need to Know

California Environmental Protection Agency

**A Air Resources Board** 

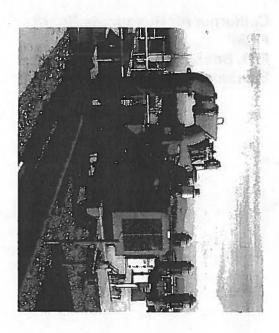
www.arb.ca.gov/perp/perp.htm

California Air Resources Board's (CARB) Registration Program (PERP) to operate Did you know that any portable engine, 50 horsepower or greater, may need a district permit or registration in the Statewide Portable Equipment in California?

MAY BE CITED BY AN AIR DISTRICT IF YOU DO NOT HAVE A PERMIT OF VALID PERP REGISTRATION, YOU **INSPECTOR!** 

- Are District Permits and Statewide Registrations the same thing?
- No. Permits are issued in district's boundaries. district's rules and in most accordance with the local air instances are only valid within the
- PERP Registrations are issued by obtain multiple district permits. equipment units without having to allows statewide operation of CARB and are valid statewide. portable engines and associated PERP is a voluntary program that
- 2) How do I apply for a district permit?
- Permits are issued by local air www.arb.ca.gov/capcoa/roster.htm districts. To find your district's contact information go to:





- ယ Is there a deadline for registering noncertified portable engines in PERP?
- Yes. Applications for registration of must be received by ARB no later between July 1, 2003 and July 1, 2004, and which resided in California current U.S. EPA off road standards, portable engines that do not meet the than December 31, 2005.
- After that date, only applications for engines meeting the current U.S. EPA off road standards will be accepted.
- 4) How do I apply for a PERP registration? Registrations for the PERP program are issued by CARB. See the back

MEET THE CURRENT U.S. EPA OFF **PORTABLE ENGINES THAT DO NOT DECEMBER 31, 2005** ABLE TO REGISTER IN PERP AFTER **ROAD STANDARDS WILL NOT BE** THE OWNERS/OPERATORS OF on obtaining application forms panel of this brochure for information

- How long does the PERP Registration process take?
- For most engines, it typically takes application. Submit your application as early as possible. from 2 to 4 weeks to process the
- 6) What does PERP registration cost?
- New Participants- \$370 for a 3-year registration until December 31, 2005
- 3-year registration. Existing Participants- \$270 for a
- Where can I get more information about PERP?
- Go on-line to view a fact sheet about and associated equipment units. of eligible uses of portable engines the program and lists The site is located at:

www.arb.ca.gov/perp/perp.htm

