

Agenda Date: August 20, 2009
Agenda Placement: Regular
Estimated Time: 20 minutes
Continued Item: No

Board Agenda Item

TO: Air Pollution Control District Board

FROM: Terry Dressler, Air Pollution Control Officer

CONTACT: Brian Shafritz (961-8823)

SUBJECT: Emission Reduction Credits from Agricultural Sources in Santa Barbara County

RECOMMENDATION

Adopt the attached Resolution that makes necessary findings and determinations in accordance with the California Health and Safety Code to require permits for any agricultural source that voluntarily creates emission reduction credits (ERCs) in Santa Barbara County.

DISCUSSION

Agricultural operations typically power water well pumps with older diesel engines that can be electrified or replaced with new cleaner diesel engines to achieve substantial emission reductions. Two agricultural sources operating in Santa Barbara County have recently submitted applications to generate ERCs by electrifying engines. Pursuant to APCD Rules 804 and 806, ERCs are not valid and cannot be granted unless the ERCs meet the test of being surplus, quantifiable, permanent, and enforceable. The APCD has determined that surplus and quantifiable criteria can be satisfied for agricultural engine control or electrification projects. However, without a legal mechanism in place to ensure that current and future owners/operators of the equipment and lands properly implement the emission reduction measure(s), there is no assurance that the ERCs will be permanent and enforceable.

Permanence is of particular concern since the intent of ERCs is to offset emissions increases from new or modified projects for the life of the project(s). Agricultural operators often lease land from land owners to produce crops. If an operator leasing land discontinues the operation or moves elsewhere, then the emission reduction measures could be modified or reversed, adversely impacting air quality. Consequently, it is essential to the viability of the ERCs that land owners, equipment owners, and operators of the equipment agree to retain the approved emission

reduction measures that generate the ERCs. Furthermore, even if an operator does not vacate the land, there must be an enforcement mechanism in place to avoid any shift in water pumping from the clean equipment to higher emitting equipment that may reside on the property or could be moved in from other locations.

The usual legal mechanism of enforcing ERCs, as specified in APCD Rule 806, is to require the modification of a Permit to Operate (PTO) for sources subject to permit. Agricultural sources were historically exempt from permitting until SB 700 was adopted in September 2003. California Health and Safety Code section 42301.16 specifies the criteria for permitting of agricultural stationary sources, and includes an exemption for small sources. The small source exemption threshold for Santa Barbara County is the emission of any air contaminant (excluding fugitive dust) under 50 tons per year of actual emissions. In Santa Barbara County the majority of agricultural sources qualify for the small source permit exemption, and only two sources to date are subject to permit. Moreover, there is no guarantee that a source subject to permit will remain under permit if emissions are reduced below the 50 ton/year threshold. Health and Safety Code section 42301.16 contains a mechanism to require permits for any source or group of agricultural sources provided certain findings are made in a public hearing.

Two sources, William Bolthouse (Bolthouse) Farms Inc. in Cuyama, and Rancho Guadalupe, L.L.C in Guadalupe, currently have ERCs applications in process with the APCD. Both have proposed to electrify internal combustion engines on various parcels that supply irrigation water for crop production at the stationary source. In order to provide flexibility for future operators or land-owners to use diesel engines, the APCD intends to base the ERC value on reductions equivalent to reducing emissions to an EPA certified Tier 4 diesel engine, rather than requiring permanent electrification. These two operators have agreed to this approach. The critical path now to granting the ERCs is to implement a mechanism to require permits to enforce the ERCs well out into the future. The permits would be conditioned to ensure the ERCs remain valid and permanent.

The APCD recommends that the APCD Board adopt the Resolution that make the necessary findings and determinations to require permits for any size agricultural operation that desires to voluntarily create ERCs. In addition, we recommend the findings specify that equipment owners, operators, and land-owners of the ranch properties be listed as permit holders. The specific findings required by Health and Safety Code section 42301.16 and the basis for the findings are presented on the following pages. It is important to note that only agricultural sources that volunteer to create ERCs would be subject to permit under these findings.

HEALTH AND SAFETY CODE REQUIREMENTS

Section 42301.16 of the Health and Safety Code allows the APCD to require permits for agricultural sources of air pollution with actual emissions less than one-half the applicable major source threshold (50 tons per year) if the District makes three findings in a public hearing. Listed below are the applicable sections of the Health and Safety Code and how each requirement has been addressed:

402301.16 (c)

- (1) “The source is not subject to a permit requirement pursuant to Section 40724.6.”**

This section pertains to requirements for large confined animal facilities (CAFs). The APCD has not identified any facilities in Santa Barbara County that qualify as a large CAF, and therefore no agricultural sources are subject to permit under this section.

- (2) “A permit is necessary to impose or enforce reductions of emission of air pollutants that the district show cause or contribute to a violation of a state or federal ambient air quality standard.”**

The function of emission reduction credits (ERCs) is to offset the air quality impacts from pollutant emissions increases at new or modified commercial or industrial stationary sources. Offsets are triggered when emissions increases from such sources exceed significance thresholds. The ERCs assigned to offset project emissions increases must remain in place for the life of the project in order to avoid degradation of air quality that could lead to violations of a state or federal standard. For agricultural sources ERCs are typically generated by controlling internal combustion engine emissions of nitrogen oxides (NO_x), sulfur oxides (SO_x), reactive organic compounds (ROC), or particulate matter less than ten microns (PM₁₀). Emissions of ROC and NO_x contribute to ambient ozone formation, and NO_x and SO_x can contribute to the formation of ambient PM₁₀. If not properly controlled over the long-term, these pollutants could cause additional violations of the State 8-hr ozone and PM₁₀ ambient air quality standards. Thus, a permit is necessary to enforce land owners, equipment owners, and the equipment operators to properly maintain approved emission reduction measures for agricultural sources that generate ERCs.

In addition, pursuant to APCD Rule 806, ERCs are not valid and cannot be granted unless the ERCs meet the test of being surplus, quantifiable, permanent, and enforceable. A permit is the most effective legal mechanism to ensure current and future owners/operators of the agricultural equipment and lands implement the emission reduction measure(s) in a manner that satisfies these criteria.

- (3) **“The requirement for a source or category of sources to obtain a permit would not impose a burden on those sources that is significantly more burdensome than permits required for other similar sources of air pollution.”**

Under SB700 and APCD Rules, agricultural stationary sources with emissions under 50 tons per year are not required to obtain permits. The requirements under these findings would ensure all agricultural sources voluntarily creating ERCs obtain permits to enforce the ERCs. APCD Rule 806.F.7 already requires existing stationary sources (of any type) subject to APCD permit to modify existing operating permits to enforce ERCs voluntarily created. Thus, there would be no requirement or burden that is any different between agricultural sources generating ERCs and other types of sources (e.g., oil and gas facilities, mineral processing facilities, etc.) already required to obtain permit modifications to enforce ERCs voluntarily created. The permit requirements for agricultural ERC sources would include a typical level of recordkeeping and reporting. Permit application fees and other costs (inspections and annual fees) would be comparable to or less than those of other permit holders.

Attachments:

- 1) Resolution

IN THE MATTER OF) RESOLUTION NO. _____
)
PERMITS FOR AGRICULTURAL SOURCES)
CREATING EMISSION REDUCTION CREDITS)

1. WHEREAS, agricultural sources of air pollution in Santa Barbara County have and may in the future propose to voluntarily create emission reduction credits (“ERCs”) for the pollutants of oxides of nitrogen, particulate matter, carbon monoxide, and reactive organic compounds.
2. WHEREAS, the pollutants of oxides of nitrogen, particulate matter, and reactive organic compounds all contribute to violations of the State 8-hour ozone standard and the State standard for particulate matter less than 10 microns (“PM₁₀”) within the District.
3. WHEREAS, in order to qualify for ERCs, any source must meet the requirements of District Rule 804(D)(2) and Rule 806(D)(1) that ERCs be surplus, enforceable, quantifiable, and permanent.
4. WHEREAS, ERCs for agricultural sources will not be enforceable or permanent unless these sources are subject to permits pursuant to Health and Safety Code section 42300.
5. WHEREAS, Health and Safety Code section 42301(a) mandates that every district shall require permits of agricultural sources that are “major source” that are required to obtain a permit pursuant to Title I ([42 U.S.C. §. 7401](#) et seq.) or Title V ([42 U.S.C. § 7661](#) et seq.) of the federal Clean Air Act.
6. WHEREAS, Health and Safety Code section 42301.16 (c) authorizes a district to require a permit for an agricultural source with actual emissions that are less than one-half of any applicable emissions threshold for a major source in the district, for any air contaminant, but excluding fugitive dust, provided three specified findings are made in a public hearing.
7. WHEREAS, the majority of agricultural sources that may seek approval of ERCs are not major sources and their actual emissions are less than one-half of the

threshold for a “major source” in the District and, therefore, are not subject to permit unless the District Board makes the requisite findings.

8. WHEREAS, some agricultural sources that seek approval of ERCs may be major sources, but could lose their major source status and requirements for permit in the future, the ERCs could be undermined unless the District Board makes the requisite findings and requires such sources to hold permits for ERCs.
9. WHEREAS, the findings of Health and Safety Code section 42301.16(c) that must be made in a public hearing before the District may require a permit are as follows:
 - a. “The source is not subject to a permit requirement pursuant to Section 40724.6 [concerning large confined animal facilities].”
 - b. “A permit is necessary to impose or enforce reductions of emission of air pollutants that the District shows cause or contribute to a violation of a state or federal ambient air quality standard.”
 - c. “The requirement for a source or category of sources to obtain a permit would not impose a burden on those sources that is significantly more burdensome than permits required for other similar sources of air pollution.”

NOW, THEREFORE, IT IS HEREBY RESOLVED, as follows:

1. The Board finds:
 - a. The agricultural sources seeking approval of ERCs are not large confined animal facilities subject to permit under Health and Safety Code section 40724.6.
 - b. Permits are necessary for agricultural sources seeking approval of ERCs in order to impose and enforce reductions of emissions of oxides of nitrogen, particulate matter, and reactive organic compounds as all of these pollutants contribute to violations of the State 8-hour ozone standard and the State PM₁₀ standard within the District.
 - c. The requirement for agricultural sources seeking approval for ERCs to obtain permits will not impose a burden on these sources that is significantly more burdensome than permits required for other similar sources of air pollution.
2. The Board determines that all agricultural sources seeking approval of ERCs shall be required to obtain permits in order to meet the requirements of Rule 804 and Rule 806 for the approval of ERCs.

3. The Board further determines that permits issued to agricultural sources to enforce ERCs shall include the equipment operator, equipment owner, and land-owners as permit holders, and that any transfer of such permit shall comply with State law and District Rules, including District Rule 203.

PASSED AND ADOPTED by the Air Pollution Control District Board of the County of Santa Barbara, State of California, this ____ day of _____, 2009, by the following vote:

AYES:

NOES:

ABSENT:

ABSTAIN:

Chair, Santa Barbara County
Air Pollution Control District Board

ATTEST:

TERENCE E. DRESSLER
Clerk of the Board

APPROVED AS TO FORM

DENNIS MARSHALL
Santa Barbara County Counsel

By _____
Deputy

By _____
Deputy