SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT

Final Environmental Assessment for:

Proposed Amended Rule 1401– New Source Review of Toxic Air Contaminants and Impact Assessment for Facilities Subject to Rule 1402 – Control of Toxic Air Contaminants from Existing Sources

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SCAQMD No. 100728JI

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PREFACE

This document constitutes the Final Environmental Assessment (EA) for Proposed Amended Rule 1401 – New Source Review of Toxic Air Contaminants and Impact Assessment for Facilities Subject to Rule 1402 – Control of Toxic Air Contaminants from Existing Sources. The Draft EA was released for a 30-day public review and comment period from July 29, 2010 to August 27, 2010. No comment letters were received from the public relative to the Draft EA. The environmental analysis in the Draft EA concluded that Proposed Amended Rule 1401 would not generate any significant adverse environmental impacts.

Minor modifications were made to the proposed amended rule subsequent to release of the Draft EA for public review. To facilitate identifying modifications to the document, added and/or modified text is underlined. Staff has reviewed these minor modifications and concluded that they do not make any impacts substantially worse or change any conclusions reached in the Draft EA. As a result, these minor revisions do not require recirculation of the document pursuant to CEQA Guidelines §15088.5. Therefore, this document now constitutes the Final EA for Proposed Amended Rule 1401.

CHAPTER 1 - PROJECT DESCRIPTION

Introduction

Legislative Authority

California Environmental Quality Act

Project Location

Project Background

Project Objectives

Project Description

Affected Facilities

Analysis of Impacts

INTRODUCTION

A substance is considered toxic if it has the potential to cause adverse health effects in humans. A toxic substance released to the air is considered a toxic air contaminant (TAC) or "air toxic." TACs are identified by state and federal agencies based on a review of available scientific evidence. Federal agencies also use the term hazardous air pollutant (HAP). In the state of California, TACs are identified through a two-step process that was established in 1983 under the Toxic Air Contaminant Identification and Control Act, Assembly Bill (AB) 1807, Tanner. This two-step process of risk identification and risk management was designed to protect residents from the health effects of toxic substances in the air. During the first step (identification), the California Air Resources Board (CARB) and the Office of Environmental Health Hazard Assessment (OEHHA) determine if a substance should be formally identified as a TAC in California. In the second step (risk management), the CARB reviews the emission sources of an identified TAC to determine if any regulatory action is necessary to reduce the risk. Exposure to TACs can potentially increase the risk of contracting cancer or result in other adverse health effects (e.g., birth defects). TACs can cause health effects through both short-term, high-level or "acute" exposure and long-term, low-level or "chronic" exposure. Many TACs are hydrocarbon substances or varieties of metals. A health risk assessment is used to estimate the likelihood that an individual would contract cancer or experience other adverse health effects as a result of exposure to listed TACs. TACs are regulated by the South Coast Air Quality Management District (SCAQMD) based on determinations of whether a substance is a TAC and it's toxicity, which are made by OEHHA. OEHHA is the state agency responsible for developing risk assessment methodologies and risk factors to be used for conducting risk evaluations, thereby establishing a state-wide standard procedure for evaluating potential health risks.

OEHHA establishes risk exposure levels (i.e., risk values) for TACs. The Scientific Review Panel (SRP) reviews and approves the methodologies used to develop these risk values, thereby finalizing the values for use by state and local agencies in assessing health risks related with exposure to TACs. Rule 1401 requires that compounds be added to the Rule 1401 Table I list of TACs when the SRP and OEHHA approve new or revised risk values.

The SCAQMD is proposing to add new and revise existing non-cancer chronic and acute Reference Exposure Levels (RELs) for acetaldehyde, acrolein, arsenic, fluorides, formaldehyde, manganese, and mercury, to the Rule 1401 list of TACs. Rule 1402 regulates the same TACs that are listed in Table I in 1401 at existing facilities. Because adding new or revising existing non-cancer chronic and acute RELs for acetaldehyde, acrolein, arsenic, fluorides, formaldehyde, manganese, and mercury, to the Rule 1401 list of TACs affects facilities subject to Rule 1402, it is

necessary to perform an impact assessment for facilities subject to Rule 1402. The primary objective of proposed amended Rule (PAR) 1401, which also affects facilities subject to Rule 1402, is to revise existing or add new risk values to the list of TACs as they have been added or amended by the state.

On August 14, 2003, new chronic risk values for fluorides, including hydrogen fluoride, were approved by the state. Risk values for fluorides have not yet been added to Rule 1401 because the required impact assessment and permit evaluations could not be completed for multi-pathway exposure. The CARB air dispersion modeling program, Hotspots Analysis Reporting Program (HARP), now provides the necessary tools to determine the multi-pathway factor for fluorides. Therefore, the multi-pathway assessment required to conduct health risk assessments and permit evaluations has been completed and chronic RELs for these compounds can be included as part of the proposed amendments to Rule 1401.

Paragraph (j)(4) of Rule 1402 requires a report to the Governing Board regarding a preliminary estimate of Rule 1402 impacts that are associated with the addition of new compounds or risk values to the list of TACs in Rule 1401. Depending on the facility and its potential toxic risk, Rule 1402 may require toxic emissions inventories, health risk assessments (HRAs), public notification, and/or risk reduction as required under Assembly Bill (AB) 2588 Air Toxics Hot Spots Program. Thus, adding new or revising existing non-cancer chronic and acute RELs for acetaldehyde, acrolein, arsenic, fluorides, formaldehyde, manganese, and mercury to Rule 1401 means these revised risk values would be used in calculating the facility risk at existing facilities, which may ultimately require risk reduction measures. Since amending Rule 1401 is expected to impact facilities under Rule 1402, this Final Environmental Assessment (EA) analyzes potentially significant adverse environmental impacts at new, modified or relocated facilities pursuant to PAR 1401 and existing facilities because Rule 1402 would regulate the same TACs listed in Table I of PAR 1401.

This Final EA, prepared pursuant to the California Environmental Quality Act (CEQA), determined after evaluation and analysis that the potential environmental impacts are not significant from implementing the proposed project. Throughout this document, references to the proposed project or PAR 1401 and impact assessment for facilities subject to Rule 1402, are used interchangeably.

LEGISLATIVE AUTHORITY

The California Legislature created the SCAQMD in 1977 (Lewis-Presley Air Quality Management Act, California Health and Safety Code §§ 40400 et seq.) as the agency responsible for developing and enforcing air pollution control rules and regulations in the Basin and portions of the Salton Sea Air Basin and Mojave Desert Air Basin. By

statute, SCAQMD is required to adopt an air quality management plan (AQMP) demonstrating compliance with all state and federal ambient air quality standards for the District [California Health and Safety Code §40460(a)]. Furthermore, SCAQMD must adopt rules and regulations that carry out the AQMP [California Health and Safety Code, §40440(a)].

In addition to regulating criteria pollutants, state law specifies that air districts may regulate TACs. Specifically, Health and Safety Code §39656, California legislature has delegated the air districts, including the SCAQMD, to establish and implement a program to regulate TACs.

CALIFORNIA ENVIRONMENTAL QUALITY ACT

PAR 1401, which also affects facilities subject to Rule 1402, is a "project" as defined by CEQA (California Public Resources Code §21080.5). SCAQMD is the lead agency for the proposed project and has prepared appropriate environmental analysis pursuant to its certified regulatory program (SCAQMD Rule 110). California Public Resources Code §21080.5 allows public agencies with regulatory programs to prepare a plan or other written document in lieu of an environmental impact report (EIR) once the Secretary of the Resources Agency has certified the regulatory program. The SCAQMD's regulatory program was certified by the Secretary of the Resources Agency on March 1, 1989, and is codified as SCAQMD Rule 110.

CEQA requires that the potential adverse environmental impacts of proposed projects be evaluated and that feasible methods to reduce or avoid significant adverse environmental impacts of these projects be identified. To fulfill the purpose and intent of CEQA, the SCAQMD has prepared this EA to address the potential adverse environmental impacts associated with adopting and implementing PAR 1401. This Final EA is intended to: (a) provide the lead agency, responsible agencies, decision makers and the general public with detailed information on the environmental effects of the proposed project; and, (b) to be used as a tool by decision makers to facilitate decision making on the proposed project.

No comments were received during the public comment period on the analysis presented in the Draft EA. Prior to making a decision on the proposed rule, the SCAQMD Governing Board must review and certify the EA as providing adequate information on the potential adverse environmental impacts of the proposed rule.

SCAQMD's review of the proposed project shows that the project would not generate significant adverse effects on the environment. Therefore, pursuant to CEQA Guidelines §15252, no alternatives or mitigation measures are included in this Final EA. The analysis in Chapter 2 supports the conclusion of no significant adverse environmental impacts.

PROJECT LOCATION

PAR 1401, including facilities subject to Rule 1402, would apply to the SCAQMD's entire jurisdiction. The SCAQMD has jurisdiction over an area of 10,473 square miles (referred to hereafter as the district), consisting of the four-county South Coast Air Basin (Basin) and the Riverside County portions of the Salton Sea Air Basin (SSAB) and the Mojave Desert Air Basin (MDAB). The Basin, which is a subarea of the SCAQMD's jurisdiction, is bounded by the Pacific Ocean to the west and the San Gabriel, San Bernardino, and San Jacinto Mountains to the north and east. The 6,745 square-mile Basin includes all of Orange County and the nondesert portions of Los Angeles, Riverside, and San Bernardino counties. The Riverside County portion of the SSAB and MDAB is bounded by the San Jacinto Mountains in the west and spans eastward up to the Palo Verde Valley. The federal nonattainment area (known as the Coachella Valley Planning Area) is a subregion of both Riverside County and the SSAB and is bounded by the San Jacinto Mountains to the west and the eastern boundary of the Coachella Valley to the east (Figure 1-1).

PROJECT BACKGROUND

Rule 1401

Rule 1401 – New Source Review for Toxic Air Contaminants (TACs) was adopted by the SCAQMD Governing Board in June 1990. The rule establishes cancer and non-cancer risk requirements for new, relocated, or modified sources of toxic air pollutants. It is amended periodically to add new compounds or new risk values to the Table I list of TACs as they are identified and risk values are finalized or amended by OEHHA. Associated cancer potency values and RELs are not listed in Rule 1401, but are added to the SCAQMD's "Risk Assessment Procedures for Rules 1401 and 212."

Rule 1402

Rule 1402 – Control of Toxic Air Contaminants from Existing Sources was adopted in April 1994. It establishes facility-wide risk requirements for existing facilities that emit TACs and implements the state Air Toxics "Hot Spots" program. Rule 1402 is not being amended, however the list of TACs in Table I of Rule 1401 are also used for Rule 1402. Depending on the facility and its potential toxic risk, Rule 1402 may require toxic emissions inventories, HRAs, public notification, and/or risk reduction as required under the AB 2588 Air Toxics "Hot Spots" Program.

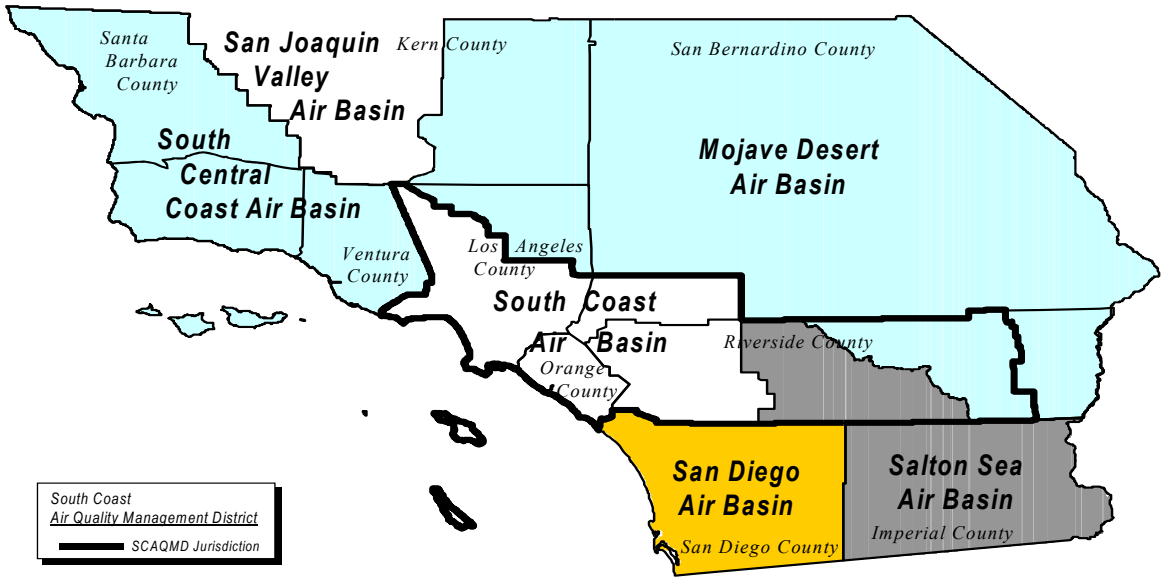

FIGURE 1-1

South Coast Air Quality Management District

Background of TACs Affected by PAR 1401

The following subsections provide background information on the TACs affected by PAR 1401. The subsections provide information on the health effects of the individual TACs as well as the years they were added to the list of TACs in Table I of Rule 1401. The proposed revisions affect the non-cancer health risk values.

Acetaldehyde

Acetaldehyde was added to Table I of Rule 1401 as a TAC in 1990 as a probable human carcinogen, based on sufficient evidence of carcinogenicity in experimental animals. In 1998, a chronic REL for non-cancer health effects was added, based on the compound's effects on the respiratory system. In 2008, a new acute REL was adopted by OEHHA and the existing chronic REL was increased, making it less stringent. A higher chronic REL indicates a higher dose level at or below which no adverse health impacts are expected. The major acute effects of human

exposure to acetaldehyde vapors consist of irritation to the eyes, skin, and respiratory tract and bronchoconstriction in asthmatics.

Acrolein

In 1999, acrolein was added to Rule 1401 as a TAC with acute health impacts based on effects to the eyes, nose and throat. A chronic REL was added in 2001, based on effects on the respiratory system. PAR 1401 would increase both the acute and chronic REL values for acrolein and are therefore less stringent than the current values.

Arsenic and Inorganic Arsenic Compounds, Including Arsine

Arsenic and inorganic arsenic compounds were added to the Rule 1401 Table I list of TACs in 1990 based on their classification as probable human carcinogens. Acute RELs for arsenic, inorganic arsenic compounds, and arsine were added in 1999 based on effects to the cardiovascular system, the nervous system and fetal development (teratogenicity). In 2001, chronic RELs were added for arsenic and inorganic arsenic compounds, based on effects to fetal development, the cardiovascular system, the nervous system, lungs, and skin. Arsenic also has an oral pathway.

Formaldehyde

Formaldehyde was added to Table I of Rule 1401 as a TAC in 1990 based on its classification as a probable human carcinogen. An acute REL was added in 1999 due to the mild to moderate eye irritation caused by short-term, high level exposure to formaldehyde. In 2000, a chronic REL was added based on long-term effects such as nasal obstruction and discomfort, lower airway discomfort, and eye irritation.

Fluorides (including Hydrogen Fluoride)

In 2004, the state approved chronic RELs for fluorides, including hydrogen fluoride, based on long-term effects to the respiratory system, bones, and teeth. At that time, staff recommended that the chronic values not be added to Rule 1401 because the required Rule 1402 impact assessment and permit evaluations could not be completed until a multi-pathway assessment was done. A multi-pathway assessment is required when compounds have more than one route (pathway) of exposure. These compounds have an oral pathway in addition to the inhalation pathway. Tools are now available to determine the multi-pathway factor for fluorides, so chronic REL for these compounds would be included as part of proposed amendments to Table I of Rule 1401.

Manganese

Chronic risk values for manganese and manganese compounds were added to Table I of Rule 1401 in 2000 based on long-term effects to the nervous system. An acute REL for manganese has not been developed at this time. Chronic exposure to manganese affects the nervous system.

Mercury

In 1999, an acute REL for mercury and mercury compounds (inorganic) was added to Table I of Rule 1401 based on short-term exposure effects to development and the nervous system. A chronic risk value was added in 2000 based on effects to the central nervous system. Mercury has an oral exposure pathway, and neurotoxicity is the most sensitive effect of mercury exposure.

PROJECT OBJECTIVES

The primary objective of PAR 1401, which also affects facilities subject to Rule 1402, is to:

1. Add new or revise existing non-cancer chronic and acute RELs for acetaldehyde, acrolein, arsenic, fluorides, formaldehyde, manganese, and mercury, to the Rule 1401 list of toxic air contaminants.

PROJECT DESCRIPTION

PAR 1401 is composed of the following detailed components, listed in the order they appear in the rule:

(a) Purpose

No proposed modification to this subdivision of the rule.

(b) Applicability

No proposed modification to this subdivision of the rule.

(c) Definitions

No proposed modification to this subdivision of the rule.

(d) Requirements

No proposed modification to this subdivision of the rule.

(e) Risk Assessment Procedures

No proposed modification to this subdivision of the rule.

(f) Emissions Calculations

No proposed modification to this subdivision of the rule.

(g) Exemptions

No proposed modification to this subdivision of the rule.

Table I

PAR 1401 would make effective the following revised chronic RELs, added to the SCAQMD's "Risk Assessment Procedures for Rules 1401 and 212": new chronic RELs would be added for fluorides and hydrogen fluoride; the chronic RELs would be raised (i.e. made less stringent) for acetaldehyde, acrolein and formaldehyde; the chronic RELs would be lowered (i.e. made more stringent) for arsenic, manganese and mercury.

Table 1-1 summarizes the chronic REL values that would be added or changed in the SCAQMD's "Risk Assessment Procedures for Rules 1401 and 212" and made effective in Table I of PAR 1401. Table 1-2 summarizes the acute REL values that would be added or changed in the SCAQMD's "Risk Assessment Procedures for Rules 1401 and 212" and made effective in Table I of PAR 1401. The tables also indicate where the new values are more or less stringent than current RELs.

Table 1-1
Summary of Revised Chronic RELs

Toxic Air Contaminant	CAS #*	Existing Chronic REL (ug/m^3)	New Chronic REL (ug/m^3)	Change in REL	Risk Driver
Acetaldehyde	75-07-0	9	140	Less Stringent	Cancer Risk
Acrolein	107-02-8	0.06	0.35	Less Stringent	Chronic Risk
Arsenic	7440-38-2	0.03	0.015	More Stringent	Cancer Risk

Table 1-1
Summary of Revised Chronic RELs (Concluded)

Toxic Air Contaminant	CAS #*	Existing Chronic REL (ug/m^3)	New Chronic REL (ug/m^3)	Change in REL	Risk Driver
Formaldehyde	50-00-0	3	9	Less Stringent	Cancer Risk
Manganese	7439-96-5	0.2	0.09	More Stringent	Chronic Risk
Mercury	7439-97-6	0.09	0.03	More Stringent	Chronic Risk
Fluorides	1101	n/a	13	New	Chronic Risk
Hydrogen Fluoride	7664-39-3	n/a	14	New	Chronic Risk

*CAS stands for Chemical Abstracts Service, who produces a "CAS registry number" which are unique numerical identifiers for chemical compounds, polymers, biological sequences, mixtures and alloys.

PAR 1401 would make effective the revised acute RELs as follows: a new acute REL would be added for acetaldehyde; the acute RELs would be raised (i.e. made less stringent) for acrolein and arsenic; the acute RELs would be lowered (i.e. made more stringent) for formaldehyde and mercury.

Table 1-2
Summary of Revised Acute RELs

Toxic Air Contaminant	CAS #*	Existing Acute REL (ug/m^3)	New Acute REL (ug/m^3)	Change in REL
Acetaldehyde	75-07-0	n/a	470	New
Acrolein	107-02-8	0.19	2.5	Less Stringent
Arsenic	7440-38-2	0.19	0.2	Less Stringent
Formaldehyde	50-00-0	94	55	More Stringent
Manganese	7439-96-5	n/a	n/a	n/a
Mercury	7439-97-6	1.8	0.6	More Stringent
Fluorides		n/a	n/a	n/a
Hydrogen Fluoride	7664-39-3	240	240	No change

*CAS stands for Chemical Abstracts Service, who produces a "CAS registry number" which are unique numerical identifiers for chemical compounds, polymers, biological sequences, mixtures and alloys.

The current proposal reflects new or amended chronic and acute RELs for the above listed compounds that were approved by OEHHA. In addition, SCAQMD's

guidance document for risk assessment, "Risk Assessment Procedures for Rules 1401 and 212", will be updated to include the new risk values.

Best available control technology (T-BACT) is typically required to control TAC emissions from new, modified or relocated equipment subject to Rule 1401. The same types of technologies would also be used to control TAC emissions as part of risk reduction measures for facilities pursuant to Rule 1402. The same T-BACT equipment is used to control TACs whether their effects are cancer or non-cancer related. If a compound has both a cancer value and a chronic REL, the more stringent of the two determines or "drives" the long-term risk. The risk driver would determine whether or not T-BACT equipment would be required. Therefore, for compounds with a cancer risk driver, the need for controls would be determined by the cancer potency value, not the chronic risk value.

Since acute REL's represent short-term exposure levels at or below which no adverse health effects are expected, there is no associated cancer risk value. Therefore, no risk driver column is included in Table 1-2. Although there is no corresponding cancer risk value for acute exposure, risk from acute RELs is typically below 1.0 or is not the overriding concern for health risk and typically not the reason for requiring controls. When a compound has a cancer value and an acute REL value or a chronic and acute REL, cancer risk or chronic risk is generally the overriding concern and the reason for requiring controls.

AFFECTED FACILITIES

Emissions of acetaldehyde, acrolein, arsenic, fluorides, formaldehyde, manganese, and mercury are generated from a wide variety of sources. The following subsections identify the industries potentially affected as a result of the proposed addition or revision of risk values in Table I of Rule 1401.

Acetaldehyde

Acetaldehyde is a colorless liquid or gas and is commonly used as an intermediate for the manufacture of a number of other chemicals. Permitted sources which may have acetaldehyde emissions include manufacturers of chemicals, wood-based building products such as fiberboard, particleboard, sheet vinyl flooring, and carpeting. Acetaldehyde is also a component in the exhaust from the combustion of various fuels, including natural gas and diesel fuel.

Acrolein

Acrolein is a colorless or yellow liquid typically described as having a piercing disagreeable odor. Its principal industrial use is as a chemical intermediate in the

production of acrylic acid and its esters. It is also a product of natural gas and diesel fuel combustion.

Arsenic and Inorganic Arsenic Compounds, Including Arsine

Industries with permitted sources of arsenic emissions include metal processes; pesticide manufacturing; ceramics; pharmaceuticals; and semiconductor manufacturing. Ore refining processes, including the smelting of copper and lead, are the major sources of the release of arsenic compounds. Processes such as smelting, galvanizing, soldering, and etching, which require the treatment of metal with strong acids are possible sources of arsine gas. Arsenic may also be a by-product of the combustion of diesel fuel, digester gas and landfill gas.

Fluorides and Hydrogen Fluoride

Hydrogen Fluoride (HF) is an acid (hydrofluoric acid) and is a colorless, fuming liquid with a sharp, penetrating odor. Hydrofluoric acid is used in a variety of industries, including, glass etching, electronics, microelectronics, petroleum refining, and chemical industries. HF is used in the manufacture of computer chips, phosphate fertilizer, metal cans, plastics, refrigerant chemicals, inorganic chemicals, soaps, detergents, commercial rust removal products, and aircraft parts. HF is also used as a catalyst in petroleum alkylation to make high-octane gasoline. HF is also emitted during the manufacture of brick and structural clay products, such as clay pipe, adobe brick, chimney pipe, flue liners, drain tiles, roofing tiles, and sewer tiles. HF and other fluoride compounds are emitted from kilns as a result of the release of the fluorine compounds contained in the raw material.

Formaldehyde

The four major applications of formaldehyde are as an intermediate in the manufacture of melamine, polyacetal, and phenolic resins; as an intermediate in the production of industrial chemicals; as a bactericide or fungicide; and as a component in the manufacture of end-use consumer products. Permitted sources which produce plywood, particleboard, foam insulation, and molded or extruded plastic items may also have formaldehyde emissions. Formaldehyde is also a product of fuel combustion, including natural gas, diesel, landfill gas, and digester gas.

Manganese and Manganese Compounds

Metallic manganese is used in many permitted manufacturing processes. Manganese is used in the manufacturing of steel, carbon steel, stainless steel, cast iron, and superalloys to increase hardness, stiffness, and strength. Other processes with manganese emissions include textile printing and dyeing; battery manufacturing; pharmaceutical and food manufacturing; ceramics and colored glass industries; paint manufacturing; and fertilizer and fungicide manufacturing. Manganese is also used as an octane enhancer in some unleaded gasolines and is released during fuel combustion. Additionally, manganese is a component in the exhaust from diesel and landfill gas combustion.

Mercury and Inorganic Mercury Compounds

Mercury and mercury-containing compounds are widely used. Permitted facilities which use mercury in the manufacture of thermometers, barometers, and thermostats may be affected by the new RELs. Mercury is commonly used for these applications due to its uniform volume expansion over a broad temperature range. Industries which use mercury to make mercury arc and fluorescent lamps; as a catalyst in oxidation of organic compounds; as a cathode in electrolysis also have mercury emissions. Other industries with mercury emissions include pulp and paper manufacturing; battery manufacturing; dental amalgam manufacturing; manufacturing of switching devices such as oscillators; and manufacturing of chlorine and caustic soda. Mercury is also used as a grain fumigant, in agricultural chemicals, in pharmaceuticals, as a preservative, as a lubricant, and as a laboratory reagent. Mercury is also a byproduct of the combustion of diesel fuel and landfill gas.

ANALYSIS OF IMPACTS

The analysis of potentially significant adverse impacts that could occur as a result of adopting PAR 1401, as well as affected facilities regulated by Rule 1402, is included in Chapter 2 of this Final EA. The analysis concluded that the proposed project would not generate significant adverse impacts to any environmental topic areas identified in Chapter 2.

CHAPTER 2 - ENVIRONMENTAL CHECKLIST

Introduction

General Information

Environmental Factors Potentially Affected

Determination

Environmental Checklist and Discussion

INTRODUCTION

The environmental checklist provides a standard evaluation tool to identify a project's adverse environmental impacts. This checklist identifies and evaluates potential adverse environmental impacts that may be created by the Proposed Amended Rule 1401– New Source Review of Toxic Air Contaminants; and Impact Assessment for Facilities Subject to Rule 1402 – Control of Toxic Air Contaminants from Existing Sources.

GENERAL INFORMATION

Project Title:	Proposed Amended Rule 1401– New Source Review of Toxic Air Contaminants; and Impact Assessment for Facilities Subject to Rule 1402 – Control of Toxic Air Contaminants from Existing Sources
Lead Agency Name:	South Coast Air Quality Management District
Lead Agency Address:	21865 Copley Drive Diamond Bar, CA 91765
CEQA Contact Person:	Jeffrey J. Inabinet (909) 396-2453
Rule Contact Person:	Cheryl Marshall (909) 396-2567
Project Sponsor's Name:	South Coast Air Quality Management District
Project Sponsor's Address:	21865 Copley Drive Diamond Bar, CA 91765
General Plan Designation:	Not applicable
Zoning:	Not applicable
Description of Project:	The proposed project would add new or revise existing non-cancer chronic and acute RELs for acetaldehyde, acrolein, arsenic, fluorides, formaldehyde, manganese, and mercury, to the Rule 1401 Table I list of TACs. Rule 1402 regulates the same TACs that are listed in Table I in 1401, but at existing facilities. Because adding new or revising existing non-cancer chronic and acute RELs for acetaldehyde, acrolein, arsenic, fluorides, formaldehyde, manganese, and mercury, to the Rule 1401 list of TACs affects facilities subject to Rule 1402, it is necessary to perform an impact assessment for facilities subject to Rule 1402 in addition to the Rule 1402 analysis for new, modified or relocated equipment.
Surrounding Land Uses and Setting:	Not applicable
Other Public Agencies Whose Approval is Required:	Not applicable

ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED

The following environmental impact areas have been assessed to determine their potential to be affected by the proposed project. None of the environmental topics are expected to be adversely affected by the proposed project. An explanation relative to the determination of impacts can be found following the checklist for each area.

☐	Aesthetics	☐	Geology and Soils	☐	Population/ Housing
☐	Agriculture and Forestry Resources	☐	Hazards and Hazardous Materials	☐	Public Services
☐	Air Quality and Greenhouse Gas Emissions	☐	Hydrology and Water Resources	☐	Recreation
☐	Biological Resources	☐	Land Use and Planning	☐	Solid/Hazardous Waste
☐	Cultural Resources	☐	Mineral Resources	☐	Transportation/Circulation
☐	Energy	☐	Noise	☐	Mandatory Findings

DETERMINATION

On the basis of this initial evaluation:

☑ I find the proposed project, in accordance with those findings made pursuant to CEQA Guideline §15252, COULD NOT have a significant effect on the environment, and that an ENVIRONMENTAL ASSESSMENT with no significant impacts will be prepared.

☐ I find that although the proposed project could have a significant effect on the environment, there will NOT be significant effects in this case because revisions in the project have been made by or agreed to by the project proponent. An ENVIRONMENTAL ASSESSMENT with no significant impacts will be prepared.

☐ I find that the proposed project MAY have a significant effect(s) on the environment, and an ENVIRONMENTAL ASSESSMENT will be prepared.

☐ I find that the proposed project MAY have a "potentially significant

impact" on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and 2) has been addressed by mitigation measures based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL ASSESSMENT is required, but it must analyze only the effects that remain to be addressed.

☐ I find that although the proposed project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier ENVIRONMENTAL ASSESSMENT pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier ENVIRONMENTAL ASSESSMENT, including revisions or mitigation measures that are imposed upon the proposed project, nothing further is required.

Date July 28, 2010 **Signature:** Steve Smith

Steve Smith, Ph.D.
Program Supervisor
Planning, Rule Development & Area Sources

GENERAL ENVIRONMENTAL IMPACT DISCUSSION

Modifying the chronic and acute RELs for the seven affected TACs could potentially affect or change the type of control equipment installed in the future at new, modified or relocated facilities or installed as part of risk reduction measures at existing facilities. Effects of new or amended SCAQMD rules or regulations are typically secondary environmental impacts generated by air pollution control equipment, e.g., solid wastes, waste water, etc.

As described in more detail in the "III. Air Quality and Greenhouse Gas Emissions" section of this chapter, the review of past AER toxic emissions data revealed that the proposed project is not expected to require additional control equipment for new, modified, or relocated facilities subject to Rule 1401. Similarly, based on the impact analysis conducted, adopting the modified chronic and acute RELs is not expected to trigger risk reduction requirements at existing affected facilities because cancer risk, which is currently the risk driver for facility-wide TAC risks, would continue to be the facility-wide risk driver. Therefore, no significant adverse direct or indirect environmental impacts are expected from the implementation of PAR 1401.

ENVIRONMENTAL CHECKLIST

		Potentially Significant Impact	Less Than Significant Impact	No Impact
I.	**AESTHETICS.** Would the project:			
a)	Have a substantial adverse effect on a scenic vista?	☐	☐	☑
b)	Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?	☐	☐	☑
c)	Substantially degrade the existing visual character or quality of the site and its surroundings?	☐	☐	☑
d)	Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	☐	☐	☑

Significance Criteria

The proposed project impacts on aesthetics will be considered significant if:

The project will block views from a scenic highway or corridor.

The project will adversely affect the visual continuity of the surrounding area.

The impacts on light and glare will be considered significant if the project adds lighting which would add glare to residential areas or sensitive receptors.

Discussion

I. a), b) & c): Review of past AER toxic emissions data revealed that the proposed project is not expected to require additional control equipment for new, modified, or relocated facilities subject to Rule 1401. Therefore, the proposed project is not expected to trigger any construction activities or substantial physical changes to existing potentially affected facilities. Additionally, construction equipment and materials will not be needed and stockpiling of construction materials will not result from the proposed project. No scenic resources will be damaged, and since no new construction of buildings or other structures is anticipated, scenic vistas will not be obstructed and the existing visual character of any site in the vicinity of affected facilities will not be degraded.

I. d). For the same reasons given in I. a), b), and c) above, there are no components in PAR 1401 and the impact assessment for facilities subject to Rule 1402 that would require construction activities at night. Therefore, no additional lighting at the facility would be required. Similarly, the proposed project has no provisions that would require affected stationary source equipment to operate at night. Thus, the proposed project is not expected to create a new source of substantial light or glare that would adversely affect day or nighttime views in the area. Therefore, the proposed project is not expected to create significant adverse aesthetic impacts.

Based on the above consideration, significant adverse impacts to aesthetics are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
II.	**AGRICULTURE AND FOREST RESOURCES.** Would the project:			
a)	Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland mapping and Monitoring Program of the California Resources Agency, to non- agricultural use?	☐	☐	☑
b)	Conflict with existing zoning for agricultural use, or a Williamson Act contract?	☐	☐	☑
c)	Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code §12220(g)), timberland (as defined by Public Resources Code §4526), or timberland zoned Timberland Production (as defined by Government Code §51104 (g))?	☐	☐	☑
d)	Result in the loss of forest land or conversion of forest land to non-forest use?	☐	☐	☑

Significance Criteria

Project-related impacts on agriculture and forest resources will be considered significant if any of the following conditions are met:

The proposed project conflicts with existing zoning or agricultural use or Williamson Act contracts.

The proposed project will convert prime farmland, unique farmland or farmland of statewide importance as shown on the maps prepared pursuant to the farmland mapping and monitoring program of the California Resources Agency, to non-agricultural use.

The proposed project conflicts with existing zoning for, or causes rezoning of, forest land (as defined in Public Resources Code §12220(g)), timberland (as

defined in Public Resources Code §4526), or timberland zoned Timberland Production (as defined by Government Code § 51104 (g)).

The proposed project would involve changes in the existing environment, which due to their location or nature, could result in conversion of farmland to non-agricultural use or conversion of forest land to non-forest use.

Discussion

II. a) - d): As discussed previously under "Aesthetics," neither modification of existing structures nor construction of new structures is anticipated to result from adopting and implementing the proposed project. Adopting and implementing the proposed project would not result in any construction of new, or modification to existing buildings or other structures that would require converting farmland to non-agricultural use or conflict with zoning for agricultural use or a Williamson Act contract. Since the proposed project would not substantially change control equipment requirements at new or existing affected facilities, there are no provisions in the proposed amended rule that would affect land use plans, policies, or regulations. Land use and other planning considerations are determined by local governments and no land use or planning requirements relative to agricultural resources will be altered by the proposed project. Additionally, the proposed project will not result in the loss or conversion of forest land or conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code §12220(g)), timberland (as defined by Public Resources Code §4526), or timberland zoned Timberland Production.

Based on the above consideration, significant adverse impacts to agriculture and forest resources are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

	Potentially Significant Impact	**Less Than Significant Impact**	**No Impact**
III. AIR QUALITY AND GREENHOUSE GAS EMISSIONS. Would the project:			
a) Conflict with or obstruct implementation of the applicable air quality plan?	☐	☐	☑
b) Violate any air quality standard or contribute to an existing or projected air quality violation?	☐	☐	☑

		Potentially Significant Impact	Less Than Significant Impact	No Impact
c)	Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard (including releasing emissions that exceed quantitative thresholds for ozone precursors)?	☐	☐	☑
d)	Expose sensitive receptors to substantial pollutant concentrations?	☐	☐	☑
e)	Create objectionable odors affecting a substantial number of people?	☐	☐	☑
f)	Diminish an existing air quality rule or future compliance requirement resulting in a significant increase in air pollutant(s)?	☐	☐	☑
g)	Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment, based on any applicable threshold of significance?	☐	☐	☑
h)	Conflict with any applicable plan, policy or regulation of an agency adopted for the purpose of reducing the emissions of greenhouse gases?	☐	☐	☑

Significance Criteria

Impacts will be evaluated and compared to the significance criteria in Table 2-1. If impacts equal or exceed any of the criteria in Table 2-1, they will be considered significant.

TABLE 2-1

Air Quality Significance Thresholds

Mass Daily Thresholds		
Pollutant	*Construction*	*Operation*
NOx	100 lbs/day	55 lbs/day
VOC	75 lbs/day	55 lbs/day
PM10	150 lbs/day	150 lbs/day
PM2.5	55 lbs/day	55 lbs/day
Sox	150 lbs/day	150 lbs/day
CO	550 lbs/day	550 lbs/day
Lead	3 lbs/day	3 lbs/day
TAC, AHM, and Odor Thresholds		
Toxic Air Contaminants (TACs, including carcinogens and non-carcinogens)	Maximum Incremental Cancer Risk $\geq$ 10 in 1 million Hazard Index $\geq$ 1.0 (project increment)	
Odor	Project creates an odor nuisance pursuant to SCAQMD Rule 402	
Ambient Air Quality for Criteria Pollutants [(a)]		
NO2 1-hour average annual average	In attainment; significant if project causes or contributes to an exceedance of any standard: 0.25 ppm (state) 0.053 ppm (federal)	
PM10 24-hour average annual geometric average annual arithmetic mean	10.4 $\mu g/m^3$ (recommended for construction) [(b)] 2.5 $\mu g/m^3$ (operation) 1.0 $\mu g/m^3$ 20 $\mu g/m^3$	
PM2.5 24-hour average	10.4 $\mu g/m^3$ (recommended for construction) [(b)] 2.5 $\mu g/m^3$ (operation)	
Sulfate 24-hour average	1 $\mu g/m^3$	
CO 1-hour average 8-hour average	In attainment; significant if project causes or contributes to an exceedance of any standard: 20 ppm (state) 9.0 ppm (state/federal)	

(a) Ambient air quality thresholds for criteria pollutants based on SCAQMD Rule 1303, Table A-2 unless otherwise stated.

(b) Ambient air quality threshold based on SCAQMD Rule 403.

PM10 = particulate matter less than 10 microns in size, ug/m3 = microgram per cubic meter; pphm = parts per hundred million; mg/m3 = milligram per cubic meter; ppm = parts per million; TAC = toxic air contaminant; AHM = Acutely Hazardous Material. NO_2 = Nitrogen Oxide, CO = Carbon Monoxide, VOC = Volatile Organic Compounds, SOx = Sulfur Oxide.

Greenhouse Gases Significance Thresholds

SCAQMD's adopted interim greenhouse gases (GHG) significance threshold proposal uses a tiered approach to determining significance. Tier 1 consists of evaluating whether or not the project qualifies for any applicable exemption under CEQA. Tier 2 consists of determining whether or not the project is consistent with a GHG reduction plan that may be part of a local general plan, for example. Tier 3 establishes a screening significance threshold level to determine significance using a 90 percent emission capture rate approach, which corresponds to 10,000 metric tons of CO_2 equivalent emissions per year ($MTCO_2eq/yr$). Tier 4 consists of a decision tree approach that allows the lead agency to choose one of three compliance options based on performance standards, but was not recommended for approval at this time. Under Tier 5 the project proponent would implement offsite mitigation (GHG reduction projects) to reduce GHG emission impacts to less than the proposed screening level. To determine whether or not greenhouse gas emissions from the proposed project may be significant, impacts will be evaluated and compared to the 10,000 MT CO2/year threshold for industrial sources.

Discussion

III. a): The proposed project would not conflict with or obstruct, air quality plan implementation. The primary purpose of the SCAQMD's AQMP is to control emissions to attain and maintain all federal and state ambient air quality standards for the district. The 2007 AQMP concluded that major reductions in emissions of VOC and NO_x are necessary to attain the air quality standards for ozone and PM10. To the extent that TACs are also considered to be VOCs or particulate matter (PM), controlling TACs through Rules 1401 and 1402 furthers the 2007 AQMP goals of reducing VOC and PM emissions.

Based on review of past AER toxic emissions data, adding or revising acute and chronic RELs for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and fluorides is not expected to require additional pollution controls for new, modified, or relocated facilities subject to Rule 1401. Therefore, no increase in emissions at the affected facilities is expected as a result of the proposed project. As a result, implementing PAR 1401 and impact assessment for facilities subject to Rule 1402 will not conflict or obstruct AQMP implementation.

III. b) & d): The proposed project is not expected to violate any ambient air quality standards or exceed any relevant air quality significance thresholds. The basis for this conclusion is provided in the following subsections.

Impact Analysis Approach

Many of the TACs with new or revised RELs are constituents of the exhaust from fuel combustion, while some of the TACs are directly emitted based on the type of operation (non-combustion). As a result, the impact analysis separately evaluated combustion and non-combustion sources of the TACs.

Combustion Sources – Rule 1401 and Rule 1402

Review of toxics emissions data revealed that the majority of emissions of the TACs with new or revised RELs are constituents of the exhaust from combustion of various fuels. However, these TACs may also be associated with non-combustion sources, and were therefore also evaluated as part of the non-combustion equipment analysis. Six out of the seven TACs with new or revised RELs (acetaldehyde, acrolein, arsenic, formaldehyde, mercury and manganese) have been identified as constituents in the exhaust from diesel fuel combustion. Diesel particulate matter (DPM) from internal combustion engines has a cancer potency value and a chronic REL which incorporate risk from all of the speciated TACs found in diesel exhaust. The cancer potency value for diesel exhaust is the risk driver for long-term risk. The cancer risk for DPM is very stringent and far outweighs the chronic or acute risk. Therefore, controls for this type of equipment are required due to cancer risk rather than the RELs. Revising the RELs for the six combustion TACs has no effect on DPM cancer risk. Further, revising the RELs for the six combustion TACs does not result in the chronic RELs becoming the risk driver. Therefore, diesel combustion from internal combustion engines was excluded from the current analysis.

The same six combustion TACs have also been identified as constituents in the exhaust from combustion of other fuels, such as natural gas, landfill gas, liquefied petroleum gas (LPG)/propane/butane, and digester gas. The overall impact on risk from various types of combustion equipment utilizing natural gas, landfill gas, LPG/propane/butane, and digester gas was assessed by calculating the chronic and acute HI values using Annual Emissions Reporting (AER) default combustion emission factors and existing RELs compared to the HI values derived from using the proposed new/revised RELs. The results of the chronic and acute HI values derived using existing RELs with the proposed RELs will determine whether or not any necessary control equipment would be changed or modified if the proposed chronic or acute RELs become the new risk drivers. Comparing the risk calculated using existing cancer potency values, chronic RELs, and acute RELs to the risk calculated using the new RELs will determine whether T-BACT requirements would be changed or modified if the proposed RELs are adopted.

Landfill Gas

Chronic and acute HI risk increased for landfill gas-fired external combustion equipment (boilers, ovens, heaters, furnaces, afterburners, dryers) when calculated with the new/revised RELs. However, a recent risk evaluation for a large landfill project involving landfill gas-fired external combustion equipment indicated that the chronic and acute risk for each piece of equipment and the total project were well below the HI threshold of 1.0. The analysis included deriving both cancer and non-cancer risk values. As a result of the analysis, the cancer risk far outweighed the chronic risk for this project and remained the risk driver. Chronic and acute HI values using existing RELs were compared to HI values derived from the proposed RELs. Using the proposed RELs, cancer risk remained the risk driver. In addition to this analysis, historical permitting data was examined to determine if controls would be required due to the new RELs, and it was determined that, where controls were required, they were required due to cancer risk rather than chronic or acute risk. Therefore, no new or modified control equipment would need to be installed that could generate any secondary environmental impacts, and no further analysis was done for landfill-gas combustion.

Digester Gas

Using the new/revised RELs, chronic and acute risk values for digester gas-fired internal combustion equipment increased. Based on historical permitting data and calculations utilizing the new RELs, chronic and acute HI values are typically well below 1 for this type of equipment. Analysis indicates that impacts to Rule 1401 are unlikely due to the stringent requirements outlined in the source-specific rule for internal combustion engines (Rule 1110.2) in combination with a limited number of new permits for this type of equipment. Rule 1402 analysis identified facilities with digester gas emissions, and compared acute and chronic HI values derived using existing RELs with HI values using the proposed RELs for large representative equipment. Using the proposed RELs, cancer risk remained the risk driver. Therefore, no new or modified control equipment would need to be installed that could generate any secondary environmental impacts.

Natural Gas, LPG, Butane and Propane

Overall chronic and acute HI risk values decreased for internal and external combustion equipment utilizing natural gas, LPG, butane, and propane, when calculated using the new/revised RELs, due to some RELs being less stringent and others more stringent. For example, natural gas-fired external combustion equipment emits acetaldehyde, acrolein, and formaldehyde. The total chronic and acute HI values calculated with the new/revised RELs resulted in a net decrease in HI values, compared to the chronic and acute HI values calculated with existing RELs. This is primarily due to the fact that the new chronic and acute RELs for acrolein are far less stringent than previous values. Acrolein accounts for 29 percent

of the total chronic HI value and 45 percent of the total acute HI value, while acetaldehyde and formaldehyde represent less than one percent and seven percent of the chronic HI and less than one percent and 13 percent of the acute HI, respectively. A decrease in chronic and acute risk HI values would not require the installation of additional control equipment or equipment modification. Based on these findings, no impacts are expected for this type of equipment.

The above analysis focused on the new or revised chronic and acute RELs for the following chemicals: manganese and mercury chronic RELs that are more stringent than existing chronic risk values and do not have cancer risk values; formaldehyde and mercury acute RELs that are more stringent than existing acute risk values; new chronic RELs for fluorides and a new acute REL for acetaldehyde. Based on the above analysis, no additional impacts for new permits or existing facilities were identified.

Non-Combustion Sources – Rule 1401

Unlike the analysis for the combustion TACs, the analysis of the non-combustion TACs is based on direct emissions of other TACs from individual stationary source equipment or processes. Consequently, the analysis is based on the effects of adding new or modifying existing RELs for individual TACs rather than a suite of combustion TACs, which are emitted together as part of the combustion process.

The impact analysis for Rule 1401 utilized the AER air toxics emissions database and SCAQMD permitting data to assess impacts from the proposed new or revised chronic and acute RELs on new, relocated, or modified permit units subject to Rule 1401. Under Rule 1401, the proposed new or revised RELs for acetaldehyde, acrolein, arsenic, fluorides, formaldehyde, manganese, and mercury will be used to calculate the chronic and acute hazard indices (HI) for new, modified, or relocated equipment requiring a permit to operate. Rule 1401 requires that all such sources have a chronic and/or acute HI less than 1.0, otherwise, the permit application would not be approved.

The first step in the analysis was to compile facility emissions data from the AER database. The database was queried for facility information and reported toxics emissions data for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and hydrogen fluoride. It should be noted that fluoride emissions are not currently collected by the SCAQMD, however, several facilities report hydrogen fluoride emissions. Therefore, the analysis for hydrogen fluoride is based on these limited emissions data.

Screening values for each compound with a new or revised REL were calculated utilizing the methodology outlined in the Rule 1401 guidance document, "Risk Assessment Procedures for Rules 1401 and 212" and are based on "worst-case"

factors for chronic and acute health effects. The screening values represent the emission level (pounds per year for chronic, or pounds per hour for acute) of a TAC which could trigger an exceedance of HI of 1.0.

SCAQMD historical permitting data were then utilized to determine if emission levels for individual equipment would exceed screening values (i.e., emissions levels representative of chronic hazard index (HIC) greater than 1.0 or acute hazard index (HIA) greater than 1.0) as a result of the new or revised RELs. The analysis involved evaluation of permitting files for individual equipment types operating at facilities with reported TAC emissions with those equipment types that exceeded the calculated screening values. Individual permit units were evaluated for emissions of the affected TACs based on factors such as, operating hours of the equipment, equipment manufacturer's data, and known emission factors, where applicable. Individual equipment emissions were compared to screening levels and, where necessary, HI values for permit units were calculated to determine if the overall chronic or acute risk increased as a result of the REL changes, and if additional emission controls would be required for permit units in order to comply with risk requirements. Examples of non-combustion equipment evaluated for permitting impacts were coatings equipment, metal melting equipment, chemical storage, asphalt processing, abrasive blasting, and plastics production. Equipment analyzed represented the largest pieces of equipment for equipment types with these TACs in the analysis. Following examination of permit data for equipment with emissions of the TACs with new or more stringent RELs, no equipment exceeded the applicable screening levels. Based on the analysis of the currently existing equipment as a surrogate for potential new equipment, the analysis found that additional emission controls or equipment modification would not be required based on the new or modified RELs.

Rule 1402

Paragraph (j)(4) of Rule 1402 requires a report to the Governing Board regarding preliminary estimates of Rule 1402 impacts that are associated with the addition of new compounds to the list of TACs in Rule 1401. Since the list of TACs in Rule 1401 is also used for Rule 1402, adding or changing the RELs will affect existing facilities subject to Rule 1402.

The Rule 1402 impact analysis used data extracted from the AER database for facilities with reported emissions of the TACs with new or revised risk values (for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and hydrogen fluoride). Following data collection, calculations were performed to determine the chronic and acute screening values representative of a HI of 3 (Rule 1402 "Action Risk Level"), for each of the compounds with new or more stringent RELs. The chronic (pounds per year) and acute (pounds per hour) screening values were calculated in accordance with the methodology outlined in the SCAQMD risk

assessment guidance document (Risk Assessment Procedures for Rules 1401 and 212), using both the new chronic or acute RELs and compared to the existing REL. The screening values were calculated using the most conservative, or "worst-case" factors for pollutant dispersion, receptor distance (25 meters), and meteorological factors.

Facilities with TAC emissions which did not exceed the new screening values (HI of 3.0) were eliminated from the analysis, since their toxics emissions levels would not trigger any new requirements under Rule 1402. Facilities with TAC emissions exceeding the existing screening values were also removed from the data set, since these facilities are currently subject to the rule requirements based on these RELs, and impacts to these facilities were assessed when the existing risk values were adopted. Facilities with TAC emissions that exceeded the new chronic or acute HI of 3.0 screening value were further analyzed by calculating HI values using the new RELs, actual pollutant dispersion, receptor distances, and meteorological correction factors. Thirty facilities still exceeding an HI of 3.0 using conservative screening methods were further analyzed by applying priority scores.

Under the AB2588 program, the SCAQMD utilizes emissions data, the carcinogenic and non-carcinogenic risk values of the substances emitted by a facility, and the distance between the source of emissions and potential receptors to calculate prioritization scores. The priority scores are used to place facilities into high, intermediate, or low priority categories for the purpose of health risk assessment. A priority score of ten or more is considered high, and the facilities are required to submit toxics emissions inventories and health risk assessments to assess the risk to their surrounding communities. Facilities which exceed a cancer risk of ten-in-one million (10×10^{-6}), as demonstrated by an approved HRA, are required to conduct public notification. Facilities that exceed the cancer action risk level of twenty-five-in-one million (25×10^{-6}), as demonstrated by an approved HRA, are required to submit a risk reduction plan and, upon approval, implement the strategies to reduce risk within three years. Facilities that exceed the significant cancer risk level of one hundred-in-one million (100×10^{-6}) are required to reduce risk as soon as possible.

Prioritization scores were analyzed for 30 facilities, including impacts from all new and revised RELs, in order to assess overall impacts from this rule amendment. Two sets of prioritization scores were calculated for the affected facilities, using the existing RELs (if applicable) and the new and revised RELs. Then, the priority score variations were analyzed to determine any potential impacts due to changes or additions of the REL values. Priority rankings for all 30 facilities remained the same when calculating priority scores based on the new/revised RELs (i.e., an increase or decrease in priority score did not change the facility's requirements under the rule). In addition, for 15 facilities, the priority score for cancer is the overriding consideration for risk, therefore, any Rule 1402/AB2588 requirements for notification, health risk assessment, or risk reduction would be triggered by their

cancer risk rather than their acute or chronic hazard indices, regardless of the new/revised chronic and acute RELs.

However, it is possible that some facilities that were not analyzed may increase HIA/HIC values to greater than 1.0, and for facilities that already exceed an HIA/HIC of 1.0, it is possible that some facilities not analyzed may generate an incremental HI increase of more than 1.0 using the revised RELs. For this scenario, the same analysis was conducted examining individual pieces of affected source equipment. To achieve a worse-case conservative analysis, the change in HIA/HIC values from large emitters of existing affected source equipment were evaluated to determine if project incremental increase would exceed the SCAQMD's significance threshold for non-cancer risk of HI of greater than or equal to 1.0. Based on this source-specific analysis, no individual pieces of affected source equipment exceeded an HIA/HIC of 1.0 using the revised RELs. Therefore, no additional control equipment or modification would be required to be installed to reduce the HIA/HIC as a result of the revised RELs.

As stated earlier, the new/revised RELs primarily affected combustion sources. Twenty-nine of the facilities that exceeded the screening level of 3.0 were facilities with risk attributable to combustion sources. One facility exceeded the screening level of 3.0, based on chronic risk from non-combustion sources, however cancer is the risk driver for that facility and would, therefore, be the reason for any risk reduction if an approved HRA indicates risk reduction is required. Upon further analysis of historical permitting data for individual equipment with emissions of the TACs being analyzed, it was determined that either the HI values were below 1.0 or that cancer risk from the equipment far outweighed the non-cancer risk and would, therefore, be the impetus for adding controls. Therefore, no additional controls are expected to be required due to the new/revised REL values for Rule 1402 facilities.

Impact Analysis Summary

For the analysis of combustion sources, review of toxics emissions data revealed that the cancer potency value is the overriding consideration for risk (diesel exhaust, landfill/digester gas) regardless of the new/revised chronic and acute RELs, and overall chronic and acute risk values decreased for internal and external combustion equipment utilizing natural gas, LPG, butane, and propane, when calculated using the new/revised RELs.

For the analysis of non-combustion sources, HIA/HIC values were calculated using the existing RELs and compared to HIA/HIC values calculated using the revised RELs. Based on source-specific analysis and historic permitting data from large emitters of existing affected source equipment, no individual pieces of affected source equipment exceeded an HIA/HIC of 1.0 using the revised RELs. Therefore,

no additional control equipment or modification would be required to be installed to reduce the HIA/HIC as a result of the revised RELs.

III. c): As already noted, implementing the proposed project is not expected to require the installation of control equipment, the construction of new structures or change production at affected facilities. Since the proposed project is not expected to generate significant adverse project-specific construction or operational air quality impacts, it is not expected to cause cumulative impacts in conjunction with other projects that may occur concurrently with or subsequent to the proposed project (CEQA Guidelines §15130(a)). The proposed project's contribution to a potentially significant cumulative impact is rendered less than cumulatively considerable and, thus, is not significant (CEQA Guidelines §15064(h)(2)).

IV. e): Objectionable odors are often associated with a number of polluting sources. As described and analyzed in Chapter 1, the review of past AER toxic emissions data revealed no facilities would be required to install control equipment or change production as a result of the proposed project. Therefore, current odor conditions at affected facilities are not expected to change or get worse. Therefore, no significant adverse odor impacts are expected from implementing PAR 1401 and impact assessment for facilities subject to Rule 1402.

V. f): The proposed project will not diminish an existing air quality rule or future compliance requirement. The analysis concludes that the proposed project would not require the installation of any new or additional control equipment or change production. Therefore, no secondary impacts from the implementation of PAR 1401 are expected. Additionally, the proposed amendments are not expected to change or worsen the existing air quality conditions at the affected facilities and, therefore, any potential adverse air quality impact from the proposed project is not significant.

VI. g) & h): As described and analyzed in Chapter 1, the review of past AER toxic emissions data revealed no facilities would be required to install control equipment or change production as a result of the proposed project. Implementation of PAR 1401 would not require any construction activities or increase any current operational emissions. Therefore, the proposed project is not expected to result in a significant GHG impact on the environment or possibly conflict with an applicable plan, policy, or regulation of an agency adopted for the purpose of reducing the emissions of GHG.

Based on the above consideration, significant adverse impacts to air quality are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
IV.	**BIOLOGICAL RESOURCES.** Would the project:			
a)	Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?	☐	☐	☑
b)	Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?	☐	☐	☑
c)	Have a substantial adverse effect on federally protected wetlands as defined by §404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?	☐	☐	☑
d)	Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	☐	☐	☑
e)	Conflicting with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	☐	☐	☑
f)	Conflict with the provisions of an adopted	☐	☐	☑

Habitat Conservation plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?

Significance Criteria

Impacts on biological resources will be considered significant if any of the following criteria apply:

The project results in a loss of plant communities or animal habitat considered to be rare, threatened or endangered by federal, state or local agencies.

The project interferes substantially with the movement of any resident or migratory wildlife species.

The project adversely affects aquatic communities through construction or operation of the project.

Discussion

IV. a), b), d): The proposed rule amendments are not expected to require any construction activities or construction of new structures and will not require any additional installations of emission control devices. The proposed project will have no direct or indirect impacts that could adversely affect plant or animal species or the habitats on which they rely in the SCAQMD's jurisdiction. Further, PAR 1401 and impact assessment for facilities subject to Rule 1402 does not require acquisition of additional land or further conversions of riparian habitats or sensitive natural communities where endangered or sensitive species may be found. Any changes to the existing physical environment would occur for business reasons, not as a result of implementing the proposed project.

IV. c): Acquisition of protected wetlands is not expected to be necessary as a result of the proposed project. Review of past AER toxic emissions data revealed that no facilities would be required to install control equipment or change production as a result of the proposed project. Therefore, adoption of the proposed project would not require the removal, filling or interrupting of any hydrological system or have an adverse effect on federally protected wetlands.

IV. e), f): There are no provisions in the proposed rule that would adversely affect land use plans, local policies or ordinances, or regulations. Land use and other planning considerations are determined by local governments and no land use or planning requirements will be altered by the proposed project. PAR 1401 and impact assessment for facilities subject to Rule 1402 would not affect in any way habitat

conservation or natural community conservation plans, agricultural resources or operations, and would not create divisions in any existing communities.

Based on the above consideration, significant adverse impacts to biological resources are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
V.	**CULTURAL RESOURCES.** Would the project:			
a)	Cause a substantial adverse change in the significance of a historical resource as defined in §15064.5?	☐	☐	☑
b)	Cause a substantial adverse change in the significance of an archaeological resource as defined in §15064.5?	☐	☐	☑
c)	Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	☐	☐	☑
d)	Disturb any human remains, including those interred outside formal cemeteries?	☐	☐	☑

Significance Criteria

Impacts to cultural resources will be considered significant if:

The project results in the disturbance of a significant prehistoric or historic archaeological site or a property of historic or cultural significance to a community or ethnic or social group.

Unique paleontological resources are present that could be disturbed by construction of the proposed project.

The project would disturb human remains.

Discussion

V. a) - d): There are existing laws in place that are designed to protect and mitigate potential impacts to cultural resources. Operators of affected facilities will not be required to perform major construction activities such as grading, trenching, etc., to comply with the proposed project. Review of past AER toxic emissions data revealed that no facilities would be required to install control equipment or change production as a result of the proposed project. Therefore, cultural resources would not be disturbed. As a result, the proposed project has no potential to cause a substantial adverse change to a historical or archaeological resource, directly or indirectly destroy a unique paleontological resource or site or unique geologic feature, or disturb any human remains, including those interred outside a formal cemeteries.

Based on the above consideration, significant adverse impacts to cultural resources are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
VI.	**ENERGY.** Would the project:			
a)	Conflict with adopted energy conservation plans?	☐	☐	☑
b)	Result in the need for new or substantially altered power or natural gas utility systems?	☐	☐	☑
c)	Create any significant effects on local or regional energy supplies and on requirements for additional energy?	☐	☐	☑
d)	Create any significant effects on peak and base period demands for electricity and other forms of energy?	☐	☐	☑
e)	Comply with existing energy standards?	☐	☐	☑

Significance Criteria

Impacts to energy and mineral resources will be considered significant if any of the following criteria are met:

The project conflicts with adopted energy conservation plans or standards.

The project results in substantial depletion of existing energy resource supplies.

An increase in demand for utilities impacts the current capacities of the electric and natural gas utilities.

The project uses non-renewable resources in a wasteful and/or inefficient manner.

Discussion

VI. a), e): Review of past AER toxic emissions data revealed that no facilities would be required to install control equipment or change production as a result of the proposed project. Therefore, the proposed project does not require additional energy demands that would conflict with adopted energy conservation plans. The proposed project is expected to comply with existing energy conservation standards, to the extent the affected facilities are operating equipment subject to energy conservation standards. Coatings, for example, are not subject to any energy conservation standard.

VI. b), c), d): As noted above, implementation of PAR 1401 and impact assessment for facilities subject to Rule 1402 will not result in the need for new or substantially altered power or natural gas utility systems. Effects of the proposed project on the electricity capacity are not expected to change because no new control equipment is expected to be installed and production is not expected to change from current operations at affected facilities. Thus, no significant adverse impacts on peak or base demands for electricity are anticipated.

Based on the above considerations, significant adverse impacts to energy are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

	Potentially Significant Impact	Less Than Significant Impact	No Impact
VII. GEOLOGY AND SOILS. Would the project:			
a) Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:	☐	☐	☑
• Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault?	☐	☐	☑
• Strong seismic ground shaking?	☐	☐	☑
• Seismic–related ground failure, including liquefaction?	☐	☐	☑
b) Result in substantial soil erosion or the loss of topsoil?	☐	☐	☑
c) Be located on a geologic unit or soil that is unstable or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	☐	☐	☑
d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial risks to life or property?	☐	☐	☑
e) Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?	☐	☐	☑

Significance Criteria

Impacts on the geological environment will be considered significant if any of the following criteria apply:

Topographic alterations would result in significant changes, disruptions, displacement, excavation, compaction or over covering of large amounts of soil.

Unique geological resources (paleontological resources or unique outcrops) are present that could be disturbed by the construction of the proposed project.

Exposure of people or structures to major geologic hazards such as earthquake surface rupture, ground shaking, liquefaction or landslides.

Secondary seismic effects could occur which could damage facility structures, e.g., liquefaction.

Other geological hazards exist which could adversely affect the facility, e.g., landslides, mudslides.

Discussion

VII. a): Facilities affected are already existing so the proposed project will not expose people to substantial geological effects greater than what they are exposed to already. Since the proposed rule amendments will not require any additional equipment beyond what is already operating, PAR 1401 and impact on facilities subject to Rule 1402 will not expose people or structures to risks of loss, injury, or death involving: rupture of an earthquake fault, seismic ground shaking, ground failure or landslides.

VII. b): The proposed project will not require major construction activities (e.g., grading, trenching, refilling and repaving), so no potential impacts to existing geophysical conditions are anticipated. Because affected facilities are primarily located at existing sites on established foundations, no soil will need to be disrupted. Therefore, no substantial soil erosion or loss of topsoil is expected from the existing affected facilities as a result of adding/amending RELs for the seven proposed compounds.

VII. c) & d): Affected facilities are primarily located at existing sites and, therefore, will not involve locating any structures on soil that is unstable or expansive. However, as already noted, no soil disturbance is anticipated from the proposed project, therefore, no further destabilization of unstable soils would be expected that could cause on- or off-site landslides, lateral spreading, subsidence, liquefaction or collapse.

VII. e): The proposed project does not involve the installation of septic tanks or alternative waste water disposal systems. Therefore, this type of soil impact will not occur.

Based on the above considerations, significant adverse impacts to geology and soils are not expected from PAR 1401 and impact assessment for facilities subject to Rule

1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
VIII.	**HAZARDS AND HAZARDOUS MATERIALS.** Would the project:			
a)	Create a significant hazard to the public or the environment through the routine transport, use, and disposal of hazardous materials?	☐	☐	☑
b)	Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?	☐	☐	☑
c)	Emit hazardous emissions, or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	☐	☐	☑
d)	Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code §65962.5 and, as a result, would create a significant hazard to the public or the environment?	☐	☐	☑
e)	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public use airport or a private airstrip, would the project result in a safety hazard for people residing or working in the project area?	☐	☐	☑
f)	Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	☐	☐	☑

		Potentially Significant Impact	Less Than Significant Impact	No Impact
g)	Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands?	☐	☐	☑
h)	Significantly increased fire hazard in areas with flammable materials?	☐	☐	☑

Significance Criteria

Impacts associated with hazards will be considered significant if any of the following occur:

Non-compliance with any applicable design code or regulation.

Non-conformance to National Fire Protection Association standards.

Non-conformance to regulations or generally accepted industry practices related to operating policy and procedures concerning the design, construction, security, leak detection, spill containment or fire protection.

Exposure to hazardous chemicals in concentrations equal to or greater than the Emergency Response Planning Guideline (ERPG) 2 levels.

Discussion

VII. a), b), & c): Equipment replacement or process changes that would require any new transport, use, or disposal of hazardous materials are not expected, thus, no new significant hazard to the public or the environment from a release of hazardous materials will occur as a result of the proposed project beyond the current risk of upset. Operating conditions and production are not expected to change at the affected facilities. Therefore, the hazard impacts are likely to remain constant with current conditions. Because no new transport of hazardous materials will occur as a result of the proposed project, emission of hazardous emissions, or handling of hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school will not result. Consequently, proposed amended Rule 1401 and impact from facilities subject to Rule 1402 will not create a

significant new hazard to the public or create a reasonably foreseeable upset condition involving the release of hazardous materials.

VIII. d): Government code §65962.5 refers to hazardous waste handling practices at facilities subject to the Resources Conservation and Recovery Act (RCRA). If any affected facilities are identified on such a list, compliance with the proposed project is not expected to affect in any way any facility's hazardous waste handling practices.

VIII. e): Regardless of whether or not affected facilities are located near airports or private airstrips, the proposed project will not create new safety hazards because the proposed project affects existing facilities. No new hazards will be introduced at affected facilities that could create safety hazards at local airports or private airstrips.

VIII. f): Implementation of the proposed project is not expected to result in product reformulations, equipment replacement or process changes. Therefore, adopted emergency response plans and emergency evacuation plans for the affected facilities will not need to be amended, and the proposed project is not expected to physically interfere with implementing adopted emergency response plans and emergency evacuation plans.

VIII. g,) & h): Since the proposed rule amendments will not require any changes to the affected facility or operational process that will expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands. Because affected facility operations are not expected to change substantially, there will be no significant increase of fire hazards in areas with flammable materials than whatever currently exists already.

Based on the above considerations, significant adverse impacts to hazards and hazardous materials are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

	Potentially Significant Impact	Less Than Significant Impact	No Impact
IX. HYDROLOGY AND WATER QUALITY. Would the project:			
a) Violate any water quality standards, waste discharge requirements, exceed wastewater treatment requirements of the applicable Regional Water Quality Control	☐	☐	☑

Board, or otherwise substantially degrade water quality?

		Potentially Significant Impact	Less Than Significant Impact	No Impact
b)	Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g. the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)?	☐	☐	☑
c)	Substantially alter the existing drainage pattern of the site or area, including through alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner that would result in substantial erosion or siltation on- or off-site or flooding on- or off-site?	☐	☐	☑
d)	Create or contribute runoff water which would exceed the capacity of existing or planned storm water drainage systems or provide substantial additional sources of polluted runoff?	☐	☐	☑
e)	Place housing or other structures within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map, which would impede or redirect flood	☐	☐	☑

flows?

		Potentially Significant Impact	Less Than Significant Impact	No Impact
f)	Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam, or inundation by seiche, tsunami, or mudflow?	☐	☐	☑
g)	Require or result in the construction of new water or wastewater treatment facilities or new storm water drainage facilities, or expansion of existing facilities, the construction of which could cause significant environmental effects?	☐	☐	☑
h)	Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new or expanded entitlements needed?	☐	☐	☑
i)	Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	☐	☐	☑

Significance Criteria

Potential impacts on water resources will be considered significant if any of the following criteria apply:

Water Quality:

The project will cause degradation or depletion of ground water resources substantially affecting current or future uses.

The project will cause the degradation of surface water substantially affecting current or future uses.

The project will result in a violation of National Pollutant Discharge Elimination System (NPDES) permit requirements.

The capacities of existing or proposed wastewater treatment facilities and the sanitary sewer system are not sufficient to meet the needs of the project.

The project results in substantial increases in the area of impervious surfaces, such that interference with groundwater recharge efforts occurs.

The project results in alterations to the course or flow of floodwaters.

Water Demand:

The existing water supply does not have the capacity to meet the increased demands of the project, or the project would use a substantial amount of potable water.

The project increases demand for water by more than five million gallons per day.

Discussion

IX. a), b), h), & i): The proposed project would not require additional control equipment installation and is not expected to change production at the affected facilities. Therefore, PAR 1401 is not expected to have a direct or indirect impact on hydrology and water quality because operators at affected facilities are not expected to use water to a greater extent than they currently use for cleaning, etc., because no additional water is required from the proposed project. Therefore, PAR 1401 and impact to facilities subject to Rule 1402 will not adversely affect water resources, water quality standards, groundwater supplies, water quality degradation, existing water supplies or wastewater treatment facilities. Because revising or adding RELs for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and fluorides at affected facilities does not require water, no changes to any existing wastewater treatment permits would be necessary. As a result, the proposed project is not expected to affect any affected facility's ability to comply with existing wastewater treatment requirements or conditions from any applicable Regional Water Quality Control Board or local sanitation district.

IX. c) & d): As discussed previously, no major construction activities will be necessary to comply with PAR 1401 and impact to facilities subject to Rule 1402, so the proposed project will not alter any existing drainage patterns, increase the rate or

amount of surface runoff water that would exceed the capacity of existing or planned stormwater drainage systems.

IX. e): PAR 1401 and impact to facilities subject to Rule 1402 does not involve or require the construction of housing so it will not result in placing housing in a 100-year flood hazard areas that could create new flood hazards. The proposed project would primarily affect existing facilities, so any flood hazards would be part of the existing setting.

IX. f): Since PAR 1401 and impact to facilities subject to Rule 1402 primarily affects existing facilities and does not require construction of new facilities, it will not create new flood risks or risks from seiches, tsunamis or mudflow conditions. Any risks from seiches, tsunamis, or mudflows would be part of the existing setting.

IX. g): Because revising or adding RELs for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and fluorides at affected facilities does not require water as part of the control equipment or control process, no increase in wastewater from complying with the proposed project that could exceed the capacity of existing stormwater drainage systems or require the construction of new wastewater or stormwater drainage facilities is anticipated.

Based on the above considerations, significant adverse impacts to hydrology and water quality are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
X.	**LAND USE AND PLANNING.** Would the project:			
a)	Physically divide an established community?	☐	☐	☑
b)	Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, specific plan, local coastal program or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect?	☐	☐	☑

Significance Criteria

Land use and planning impacts will be considered significant if the project conflicts with the land use and zoning designations established by local jurisdictions.

Discussion

X. a.): Since PAR 1401 does not require additional control equipment installation and is not expected to change production at the affected facilities, the proposed project will not create divisions in any existing communities because this provision applies generally to operations at existing facilities. Similarly, the proposed project does not require construction of new structures that could physically divide an established community. Any new structures would be built for reasons other than to comply with the proposed project, such as starting a new, or relocating an existing business.

X. b): Operations at affected facilities using the compounds with new or revised RELs would still be expected to comply, and not interfere, with any applicable land use plans, zoning ordinances, habitat conservation or natural community conservation plans. There are no provisions of the proposed project that would directly affect these plans, policies, or regulations. Land use and other planning considerations are determined by local governments and no present or planned land uses in the region or planning requirements will be altered by the proposed project.

Based on the above considerations, significant adverse impacts to land use and planning are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
XI.	**MINERAL RESOURCES.** Would the project:			
a)	Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	☐	☐	☑
b)	Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific	☐	☐	☑

plan or other land use plan?

Significance Criteria

Project-related impacts on mineral resources will be considered significant if any of the following conditions are met:

The project would result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state.

The proposed project results in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan.

Discussion

XI. a), b): There are no provisions of the proposed rule that would directly result in the loss of availability of a known mineral resource, such as aggregate, coal, shale, etc., of value to the region and the residents of the state, or of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan. PAR 1401 and impacts to facilities subject to Rule 1402 revises or adds acute and chronic RELs for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and fluorides, and does not require risk reduction measures that would need a mineral resource to comply. Based on the above considerations, significant adverse impacts to mineral resources are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
XII. NOISE. Would the project result in:				
a)	Exposure of persons to or generation of permanent noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?	☐	☐	☑
b)	Exposure of persons to or generation of excessive groundborne vibration or	☐	☐	☑

groundborne noise levels?

		Potentially Significant Impact	Less Than Significant Impact	No Impact
c)	A substantial temporary, or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?	☐	☐	☑
d)	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public use airport or private airstrip, would the project expose people residing or working in the project area to excessive noise levels?	☐	☐	☑

Significance Criteria

Impacts on noise will be considered significant if:

Construction noise levels exceed the local noise ordinances or, if the noise threshold is currently exceeded, project noise sources increase ambient noise levels by more than three decibels (dBA) at the site boundary. Construction noise levels will be considered significant if they exceed federal Occupational Safety and Health Administration (OSHA) noise standards for workers.

The proposed project operational noise levels exceed any of the local noise ordinances at the site boundary or, if the noise threshold is currently exceeded, project noise sources increase ambient noise levels by more than three dBA at the site boundary.

Discussion

XII. a), b), c) & d): Revising or adding chronic and acute RELs for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and fluorides will not generate additional or new noise, excessive groundborne vibration, or substantially increase ambient noise levels beyond existing levels. The proposed project would not require new or additional control equipment. Therefore, noise levels at affected facilities are not expected to change. As a result, the proposed rule would have no new or additional noise impacts.

As indicated in the preceding discussion, noise levels are not expected to change as a result of the proposed project and, therefore, will have a neutral effect on noise levels from affected facilities that may be located within two miles of an airport or private airstrip.

Based on the above considerations, significant adverse impacts to noise are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

		Potentially Significant Impact	Less Than Significant Impact	No Impact
XIII.	**POPULATION AND HOUSING.** Would the project:			
a)	Induce substantial growth in an area either directly (for example, by proposing new homes and businesses) or indirectly (e.g. through extension of roads or other infrastructure)?	☐	☐	☑
b)	Displace substantial numbers of people or existing housing, necessitating the construction of replacement housing elsewhere?	☐	☐	☑

Significance Criteria

Impacts of the proposed project on population and housing will be considered significant if the following criteria are exceeded:

The demand for temporary or permanent housing exceeds the existing supply.

The proposed project produces additional population, housing or employment inconsistent with adopted plans either in terms of overall amount or location.

Discussion

XIII. a) & b): Human population in the SCAQMD's jurisdiction is anticipated to grow regardless of implementing the proposed project. The proposal would amend or add chronic and acute RELs for acetaldehyde, acrolein, arsenic, formaldehyde,

manganese, mercury and fluorides, which will not require additional employees or alter operational procedures. The proposed project would not require affected facilities to install any additional control equipment. Therefore, the District population will not be affected directly or indirectly as a result of adopting and implementing PAR 1401 and impact to facilities subject to Rule 1402. Further, the proposed project will not indirectly induce growth in the area of the affected facilities. The construction of single- or multiple-family housing units would not be required as a result of implementing the proposed project since no new employees will be required at affected facilities. The proposed project will not require relocation of affected facilities, so existing housing or populations in the District are not anticipated to be displaced necessitating the construction of replacement housing elsewhere.

Based on the above considerations, significant adverse impacts to population and housing are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

	Potentially Significant Impact	**Less Than Significant Impact**	**No Impact**
XIV. PUBLIC SERVICES. Would the proposal result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered government facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the following public services:			
a) Fire protection?	☐	☐	☑
b) Police protection?	☐	☐	☑
c) Schools?	☐	☐	☑
d) Other public facilities?	☐	☐	☑

Significance Criteria

Impacts on public services will be considered significant if the project results in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, or the need for new or physically altered government facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response time or other performance objectives.

Discussion

XIV. a) & b): The proposed project will not involve the use of acutely hazardous materials. Thus, no new fire hazards or increased use of hazardous materials would be introduced at existing affected facilities. Thus, no new demands for fire or police protection are expected from PAR 1401 and impact on facilities subject to Rule 1402 since the proposed new or revised chronic and acute RELs will not require actions warranting additional fire or police protection.

XIV. c), d): As noted in the "Population and Housing" discussion, implementing PAR 1401 and impact on facilities subject to Rule 1402 will not require construction activities or permanent employees to continue operation at existing affected facilities. As a result, the proposed project will have no direct or indirect effects on population growth in the District. Consequently, no new impacts to schools, parks or other recreational facilities are foreseen as a result of implementing the proposed project. Because the proposed project does not require modifications at affected facilities, the proposal would not result in the need for new or physically altered government facilities in order to maintain acceptable service ratios, response times or other performance objectives.

Based on the above considerations, significant adverse impacts to public services are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

	Potentially Significant Impact	Less Than Significant Impact	No Impact
XV. RECREATION.			
a) Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated.?	☐	☐	☑
b) Does the project include recreational facilities or require the construction or expansion of recreational facilities that might have an adverse physical effect on the environment or recreational services?	☐	☐	☑

Significance Criteria

Impacts to recreation will be considered significant if:

The project results in an increased demand for neighborhood or regional parks or other recreational facilities.

The project adversely effects existing recreational opportunities.

Discussion

XV. a) & b): As discussed under "Land Use and Planning" above, there are no provisions in the proposed project that would affect land use plans, policies or ordinances, or regulations. Land use and other planning considerations are determined by local governments; no land use or planning requirements will be altered by the proposal. As already noted in item XII, Population and Housing, the proposed project is not expected to increase population growth in the District because no additional operational or construction employees would be required at affected facilities. Therefore, no additional demand for recreation facilities is anticipated. Further, the proposed project would not increase the use of existing neighborhood and regional parks or other recreational facilities or include recreational facilities or require the construction or expansion of recreational facilities that might have an adverse physical effect on the environment or recreational services.

Based on the above considerations, significant adverse impacts to recreation are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

	Potentially Significant Impact	Less Than Significant Impact	No Impact
XVI. SOLID/HAZARDOUS WASTE. Would the project:			
a) Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs?	☐	☐	☑
b) Comply with federal, state, and local statutes and regulations related to solid and hazardous waste?	☐	☐	☑

Significance Criteria

The proposed project impacts on solid/hazardous waste will be considered significant if the following occur:

The generation and disposal of hazardous and non-hazardous waste exceeds the capacity of designated landfills.

Discussion

XVI. a): The proposed amendments would not change the affected facilities current solid waste disposal needs as the existing operations would not change as a result of the new/revised chronic and acute RELs.

XVI. b): It is expected that proposed project will have no effect on an operator's ability to comply with relevant statutes and regulations related to solid and hazardous wastes. Consequently, it is anticipated that operators of affected facilities would continue to comply with federal, state, and local statutes and regulations related to solid and hazardous waste handling and disposal. Therefore, potential solid waste impacts are considered not significant.

Based on the above consideration, significant adverse impacts to solid/hazardous waste are not expected from PAR 1401 and impact assessment for facilities subject to

Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

	Potentially Significant Impact	Less Than Significant Impact	No Impact
XVII. TRANSPORTATION/TRAFFIC. Would the project:			
a) Conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, taking into account all modes of transportation including mass transit and non-motorized travel and relevant components of the circulation system, including but not limited to intersections, streets, highways and freeways, pedestrian and bicycle paths, and mass transit?	☐	☐	☑
b) Conflict with an applicable congestion management program, including but not limited to level of service standards and travel demand measures, or other standards established by the county congestion management agency for designated roads or highways?	☐	☐	☑
c) Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in substantial safety risks?	☐	☐	☑
d) Substantially increase hazards due to a design feature (e.g. sharp curves or dangerous intersections) or incompatible uses (e.g. farm equipment)?	☐	☐	☑
e) Result in inadequate emergency access?	☐	☐	☑
f) Conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities?	☐	☐	☑

Significance Criteria

Impacts on transportation/traffic will be considered significant if any of the following criteria apply:

Peak period levels on major arterials are disrupted to a point where level of service (LOS) is reduced to D, E or F for more than one month.

An intersection's volume to capacity ratio increase by 0.02 (two percent) or more when the LOS is already D, E or F.

A major roadway is closed to all through traffic, and no alternate route is available.

The project conflicts with applicable policies, plans or programs establishing measures of effectiveness, thereby decreasing the performance or safety of any mode of transportation.
There is an increase in traffic that is substantial in relation to the existing traffic load and capacity of the street system.

The demand for parking facilities is substantially increased.

Water borne, rail car or air traffic is substantially altered.

Traffic hazards to motor vehicles, bicyclists or pedestrians are substantially increased.

The need for more than 350 employees.

An increase in heavy-duty transport truck traffic to and/or from the facility by more than 350 truck round trips per day.

Increase customer traffic by more than 700 visits per day.

Discussion

XVII. a) & b): As noted in the "Discussion" sections of other environmental topics compliance with PAR 1401 and impact to facilities subject to Rule 1402 is not expected to require construction activities and would not require the installation of any additional control equipment. No additional vehicle trips are expected, and, therefore, the project is not expected to generate a significant increase in traffic. Continuing operation at affected facilities will add no new trips because no new employees are expected to be required.

XVII. c): Air traffic patterns are not expected to be directly or indirectly affected by the proposed project because the proposed project does not involve new additional transport of products beyond what is currently transported by air nor will operation at existing facilities interfere with air traffic. All applicable local, state and federal requirements would continue to be complied with so no increase in any safety risks is expected.

XVII. d), e): PAR 1401 and impact to facilities subject to Rule 1402 does not have direct or indirect impacts on specific construction design features because the proposed project does not require or induce the construction of any roadways or other transportation design features. In addition, the proposed project affects existing facilities so will not result in inadequate emergency access beyond what already currently exists.

XVII. f): Affected facilities would still be expected to comply with, and not interfere with adopted policies, plans, or programs supporting alternative transportation. The proposed project will add or revise acute and chronic RELs for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and fluorides, and has no provision that will hinder compliance with any applicable alternative transportation plans or policies.

Based on the above considerations, significant adverse impacts to transportation/circulation are not expected from PAR 1401 and impact assessment for facilities subject to Rule 1402. Since there are no significant adverse impacts, no mitigation measures are required.

	Potentially Significant Impact	Less Than Significant Impact	No Impact
XVIII. MANDATORY FINDINGS OF SIGNIFICANCE.			
a) Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?	☐	☐	☑

	Potentially Significant Impact	Less Than Significant Impact	No Impact
b) Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)	☐	☐	☑
c) Does the project have environmental effects that will cause substantial adverse effects on human beings, either directly or indirectly?	☐	☐	☑

Discussion

XVIII. a): As discussed in items I through XVII above, PAR 1401 and impact to facilities subject to Rule 1402 has no potential to cause significant adverse environmental effects because the potential impacts from adding or revising acute and chronic RELs for acetaldehyde, acrolein, arsenic, formaldehyde, manganese, mercury and fluorides at affected facilities are less than significant. Therefore, the proposed project is not expected to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal. Similarly, the proposed project includes no provision that would eliminate important examples of the major periods of California history or prehistory or otherwise degrade cultural resources.

XVIII.b) Based on the foregoing analyses, since PAR 1401 and impact to facilities subject to Rule 1402 will not result in project-specific significant environmental impacts, the proposed project is not expected to cause cumulative impacts in conjunction with other projects that may occur concurrently with or subsequent to the proposed project. Furthermore, the proposed project impacts will not be "cumulatively considerable" because the incremental impacts are not considerable when viewed in connection with the effects of past, current, or probable future projects.

XVIII.c) Based on the foregoing analyses, PAR 1401 and impact assessment for facilities subject to Rule 1402 is not expected to cause significant adverse effects on human beings, either directly, or indirectly.

APPENDIX A

PROPOSED AMENDED RULE 1401

(Adopted June 1, 1990)(Amended December 7, 1990)
(Amended July 10, 1998)(Amended January 8, 1999)
(Amended March 12, 1999)(Amended August 13, 1999)
(Amended March 17, 2000)(Amended August 18, 2000)
(Amended June 15, 2001)(Amended May 3, 2002)(Amended February 7, 2003)
(Amended May 2, 2003)(Amended March 4, 2005)(Amended March 7, 2008)
(Amended June 5, 2009)
PAR 1401a
April 8, 2010

PROPOSED AMENDED RULE 1401. NEW SOURCE REVIEW OF TOXIC AIR CONTAMINANTS

(a) Purpose

This rule specifies limits for maximum individual cancer risk (MICR), cancer burden, and noncancer acute and chronic hazard index (HI) from new permit units, relocations, or modifications to existing permit units which emit toxic air contaminants listed in Table I. The rule establishes allowable risks for permit units requiring new permits pursuant to Rules 201 or 203.

(b) Applicability

(1) Applications for new, relocated, and modified permit units which were received by the District on or after June 1, 1990 shall be subject to Rule 1401. Applications shall be subject to the version of Rule 1401 that is in effect at the time the application is deemed complete. Permit units installed without a required permit to construct shall be subject to this rule, if the application for a permit to operate such equipment was submitted after June 1, 1990.

(2) This rule shall apply to new, relocated, and modified equipment identified in Rule 219 as not requiring a written permit if the risk from the equipment will be greater than identified in subparagraph (d)(1)(A), or paragraphs (d)(2) or (d)(3) in Rule 1401.

(c) Definitions

(1) ACCEPTABLE STACK HEIGHT for a permit unit is defined as a stack height that does not exceed two and one half times the height of the permit unit or two and one half times the height of the building housing the permit unit, and shall not be greater than 65 meters (213 feet), unless the applicant demonstrates to the satisfaction of the Executive Officer that a

greater height is necessary.

(2) BEST AVAILABLE CONTROL TECHNOLOGY FOR TOXICS (T-BACT) means the most stringent emissions limitation or control technique which:

(A) has been achieved in practice for such permit unit category or class of source; or

(B) is any other emissions limitation or control technique, including process and equipment changes of basic and control equipment, found by the Executive Officer to be technologically feasible for such class or category of sources, or for a specific source.

(3) CANCER BURDEN means the estimated increase in the occurrence of cancer cases in a population subject to a MICR of greater than or equal to one in one million (1.0×10^{-6}) resulting from exposure to toxic air contaminants.

(4) CONTEMPORANEOUS RISK REDUCTION means any reduction in risk resulting from a decrease in emissions of toxic air contaminants at the facility that is permanent, real, quantifiable and enforceable through District permit conditions. Permit applications associated with the increase and decrease in risk must be submitted together and the reduction of risk must occur before the start of operation of the permit unit that will have an increased risk. A contemporaneous risk reduction shall be calculated based on the actual average annual emissions, as determined by facility records, and annual emissions declarations pursuant to Rule 301 as appropriate, or other data approved by the Executive Officer, whichever is less, which have occurred during the two-year period immediately preceding the date of application.

(5) FACILITY means any permit unit or grouping of permit units or other air contaminant-emitting activities which are located on one or more contiguous properties within the District, in actual physical contact or separated solely by a public roadway or other public right-of-way, and are owned or operated by the same person (or by persons under common control), or an outer continental shelf (OCS) source as determined in 40 CFR Section 55.2. Such above-described groupings, if noncontiguous, but connected only by land carrying a pipeline, shall not be considered one facility. Notwithstanding the above, sources or installations involved in crude oil and gas production in Southern California Coastal or OCS

Waters and transport of such crude oil and gas in Southern California Coastal or OCS Waters shall be included in the same facility which is under the same ownership or use entitlement as the crude oil and gas production facility on-shore.

(6) INDIVIDUAL SUBSTANCE ACUTE HAZARD INDEX (HI) is the ratio of the estimated maximum one-hour concentration of a toxic air contaminant for a potential maximally exposed individual to its acute reference exposure level.

(7) INDIVIDUAL SUBSTANCE CHRONIC HAZARD INDEX (HI) is the ratio of the estimated long-term level of exposure to a toxic air contaminant for a potential maximally exposed individual to its chronic reference exposure level. The chronic hazard index calculations shall include multipathway consideration, if applicable.

(8) MAXIMUM INDIVIDUAL CANCER RISK (MICR) is the estimated probability of a potential maximally exposed individual contracting cancer as a result of exposure to toxic air contaminants over a period of 70 years for residential receptor locations. The MICR for worker receptor locations shall be calculated pursuant to the Risk Assessment Procedures referenced in subdivision (e). The MICR calculations shall include multipathway consideration, if applicable.

(9) MODIFICATION means any physical change in, change in method of operation, or addition to an existing permit unit that requires an application for a permit to construct and/or operate. Routine maintenance and/or repair shall not be considered a physical change. A change in the method of operation of equipment, unless previously limited by an enforceable permit condition, shall not include:

(A) an increase in the production rate, unless such increase will cause the maximum design capacity of the equipment to be exceeded; or

(B) an increase in the hours of operation; or

(C) a change in ownership of a source; or

(D) a change in formulation of the materials processed which will not result in a net increase of the MICR, cancer burden, or chronic or acute HI from the associated permit unit.

For facilities that have been issued a facility permit pursuant to Regulation XX or a Title V permit pursuant to Regulation XXX, modification means any physical change in, change in method of operation of, or addition to an

existing individual article, machine, equipment or other contrivance which would have required an application for a permit to construct and/or operate, were the unit not covered under a facility permit or Title V permit.

(10) PERMIT UNIT means any article, machine, equipment, or other contrivance, or combination thereof, which may cause or control the issuance of air contaminants, and which requires a written permit pursuant to Rules 201 and/or 203. For facilities that have been issued a facility permit or Title V permit, a permit unit for the purpose of this rule means any individual article, machine, equipment or other contrivance which may cause or control the issuance of air contaminants and which would require a written permit pursuant to Rules 201 and/or 203 if it was not covered under a facility permit or Title V permit. For publicly-owned sewage treatment operations, each process within multi-process permit units at the facility shall be considered a separate permit unit for purposes of this rule.

(11) RECEPTOR LOCATION means

(A) for the purpose of calculating acute HI, any location outside the boundaries of the facility at which a person could experience acute exposure; and

(B) for the purpose of calculating chronic HI and MICR, any location outside the boundaries of the facility at which a person could experience chronic exposure.

The Executive Officer shall consider the potential for exposure in determining whether the location will be considered a receptor location.

(12) RELOCATION means the removal of an existing permit unit from one parcel of land in the District and installation at another parcel of land where two parcels are not in actual physical contact and are not separated solely by a public roadway or other public right-of-way. The removal of a permit unit from one location within a facility and installation at another location within the facility is a relocation only if an increase in maximum individual cancer risk in excess of one in one million (1×10^{-6}) or a Hazard Index of 1.0 occurs at any receptor location.

(13) TOTAL ACUTE HAZARD INDEX (HI) is the sum of the individual substance acute HIs for all toxic air contaminants affecting the same target organ system.

(14) TOTAL CHRONIC HAZARD INDEX (HI) is the sum of the individual substance chronic HIs for all toxic air contaminants affecting the same target organ system.

(15) TOXIC AIR CONTAMINANT is an air pollutant which may cause or contribute to an increase in mortality or serious illness, or which may pose a present or potential hazard to human health. For the purpose of this rule, toxic air contaminants are those listed in Table I.

(d) Requirements

The requirements of paragraphs (d)(2) and (d)(3) shall become effective September 8, 1998. The Executive Officer shall deny the permit to construct a new, relocated or modified permit unit if emissions of any toxic air contaminant listed in Table I may occur, unless the applicant has substantiated to the satisfaction of the Executive Officer all of the following:

(1) MICR and Cancer Burden

The cumulative increase in MICR which is the sum of the calculated MICR values for all toxic air contaminants emitted from the new, relocated or modified permit unit will not result in any of the following:

(A) an increased MICR greater than one in one million (1.0×10^{-6}) at any receptor location, if the permit unit is constructed without T-BACT;

(B) an increased MICR greater than ten in one million (1.0×10^{-5}) at any receptor location, if the permit unit is constructed with T-BACT;

(C) a cancer burden greater than 0.5.

(2) Chronic Hazard Index

The cumulative increase in total chronic HI for any target organ system due to total emissions from the new, relocated or modified permit unit owned or operated by the applicant for which applications were deemed complete on or after the date when the risk value for the compound is finalized by OEHHA, unless paragraph (e)(3) applies, will not exceed 1.0 at any receptor location.

(3) Acute Hazard Index

The cumulative increase in total acute HI for any target organ system due to total emissions from the new, relocated or modified permit unit owned or operated by the applicant for which applications were deemed complete

on or after the date when the risk value for the compound is finalized by OEHHA, unless paragraph (e)(3) applies, will not exceed 1.0 at any receptor location.

(4) Risk Per Year

The risk per year shall not exceed 1/70 of the maximum allowable risk specified in (d)(1)(A) or (d)(1)(B) at any receptor locations in residential areas.

(5) If a permit contains operating conditions imposed pursuant to Rule 1401, which prohibit or limit the use or emission of toxic air contaminants, those conditions shall apply only to those toxic air contaminants listed in the version of Rule 1401 applicable at the time the permit conditions were imposed.

(6) Federal New Source Review for Toxics

Pursuant to Section 112(g) of the federal Clean Air Act (CAA), no person shall begin construction or reconstruction of a major stationary source emitting hazardous air pollutants listed in Section 112 (b) of the CAA, unless the source is constructed with Best Available Control Technology for Toxics (T-BACT) and complies with all other applicable requirements, including definitions and public noticing, referenced in 40 CFR 63.40 through 63.44. The requirements of this paragraph shall not apply to:

(A) any source that is subject to an existing National Emission Standard for Hazardous Air Pollutants (NESHAP) pursuant to sections 112(d), 112(h), or 112(j) of the federal CAA;

(B) any source that is exempted from regulations under a NESHAP issued pursuant to sections 112(d), 112(h), or 112(j) of the federal CAA;

(C) any source that has received all necessary air quality permits for such construction or reconstruction before June 29, 1998;

(D) electric utility steam generating units, unless and until such time as these units are added to the source category list pursuant to the requirements of section 112(c)(5) of the federal CAA;

(E) any sources that are within a source category that has been deleted from the source category list pursuant to section 112(c)(9) of the federal CAA; or

(F) research and development activities.

Compliance with this paragraph does not relieve any owner or operator of a major stationary source from complying with all other applicable District rules and regulations, including this rule, any applicable state airborne toxic control measure, or other applicable state and federal laws. Exemptions under subdivision (g) of this rule do not apply to this paragraph. This paragraph shall take effect retroactively from June 29, 1998.

(e) Risk Assessment Procedures

(1) The Executive Officer shall periodically publish procedures for determining health risks under this rule. To the extent possible, the procedures will be consistent with the policies and procedures of the state Office of Environmental Health Hazard Assessment (OEHHA).

(2) Within 150 days of risk values for compounds not in Table I being finalized by OEHHA, staff will bring proposed amendments to this rule to reflect changes to Table I.

(3) Within 150 days of risk values for compounds in Table I being updated by OEHHA, staff will:

(A) publish a Notice of Intent to change risk values;

(B) perform an impact assessment, including socioeconomic effects; and

(C) submit a report to the District Governing Board with recommendations for changing the risk values in the procedures for determining risk assessment published pursuant to paragraph (e)(1).

(4) To calculate the cumulative increase in MICR pursuant to paragraph (d)(1), the increase from each permit unit shall be based on the emissions of toxic air contaminants, the risk values, and risk assessment procedures applicable at the time when each complete application was deemed complete by the District.

(f) Emissions Calculations

(1) For the purpose of determining MICR and cancer burden due to a new or relocated permit unit pursuant to this rule, the total Toxic Air Contaminant emissions from the new or relocated permit unit shall be calculated on an

annual basis from permit conditions which directly limit the emissions or, when no such conditions are imposed, from:

(A) the maximum rated capacity;

(B) the maximum possible annual hours of operation;

(C) the maximum annual emissions; and

(D) the physical characteristics of the materials processed.

(2) For the purpose of determining chronic HI due to a new or relocated permit unit pursuant to this rule, the total emissions from a permit unit shall be calculated on an annual average basis from permit conditions which directly limit the emissions or, when no such conditions are imposed, from:

(A) the maximum rated capacity;

(B) the annual average hours of operation;

(C) the annual average emissions; and

(D) the physical characteristics of the materials processed.

(3) For the purpose of determining MICR, cancer burden and chronic HI due to a modified permit unit pursuant to this rule, the increase in emissions from the modified permit unit shall be calculated based on the difference between the total permitted emissions after the modification, calculated pursuant to the criteria established in subparagraphs (f)(1)(A), (B), (C), and (D), and:

(A) the total permitted emissions prior to the modification as stated in the permit conditions; or

(B) if there are no existing permit conditions that limit emissions, the average annual emissions which have occurred during the two-year period immediately preceding the date of the complete permit application for modification or other appropriate period determined by the Executive Officer to be representative of a permit unit's operation; or

(C) for modification of any source installed prior to October 8, 1976, resulting from the addition of air pollution controls installed solely to reduce the issuance of air contaminants, emission shall be calculated from permit conditions which directly limit the emissions or, when no such conditions are imposed, from:

(i) the maximum rated capacity; and

(ii) the maximum proposed daily hours of operation; and

(iii) the physical characteristics of the materials processed.

(4) For the purpose of determining acute HI due to a new, relocated or modified permit unit pursuant to this rule, the total emissions from a permit unit shall be calculated on a maximum hourly basis from permit conditions which directly limit the emissions or, when no such conditions exist, from:

(A) the maximum rated capacity;

(B) the maximum hourly emissions; and

(C) the physical characteristics of the materials processed.

(5) De Minimus Values

Any permit unit with values at or below the screening levels as specified in the procedures for determining health risks under this rule, published pursuant to paragraph (e)(1), shall be deemed in compliance with the requirements of subdivision (d).

(g) Exemptions

(1) The requirements of subdivision (d) shall not apply to:

(A) Permit Renewal or Change of Ownership

Any permit unit which is in continuous operation, without modification or change in operating conditions, for which a new permit to operate is required solely because of permit renewal or change of ownership.

(B) Modification with No Increase in Risk

A modification of a permit unit that causes a reduction or no increase in the cancer burden, MICR or acute or chronic HI at any receptor location.

(C) Functionally Identical Replacement

A permit unit replacing a functionally identical permit unit, provided there is no increase in maximum rating or increase in emissions of any toxic air contaminants. For replacement of dry cleaning permit units only, provided there is no increase in any toxic air contaminants.

(D) Equipment Previously Exempt Under Rule 219

Equipment which previously did not require a written permit pursuant to Rule 219 that is no longer exempt, provided that the equipment was installed prior to the Rule 219 amendment

eliminating the exemption and a complete application for the permit is received within one (1) year after the Rule 219 amendment removing the exemption.

(E) Modifications to Terminate Research Projects

Modifications restoring the previous permit conditions of a permit unit, provided that: the applicant demonstrates that the previous permit conditions were modified solely for the purpose of installing innovative control equipment as part of a demonstration or investigation designed to advance the state of the art with regard to controlling emissions of toxic air contaminants; the emission reductions achieved by the demonstration project are not used for permitting any equipment with emission increases under the contemporaneous emission reduction exemption as specified in paragraph (g)(2); the demonstration project is completed within two (2) years; and a complete application is submitted no later than two (2) years after the date of issuance of the permit which modified the conditions of the previous permit for the purpose of the demonstration or investigation.

(F) Emergency Internal Combustion Engines

Emergency internal combustion engines that are exempted under Rule 1304.

(G) Wood Product Stripping

Wood product stripping permit units, provided that the risk increases due to emissions from the permit unit owned or operated by the applicant for which complete applications were submitted on or after July 10, 1998 will not exceed a MICR of 100 in one million (1.0×10^{-4}) or a total acute or chronic hazard index of five (5) at any receptor location. This exemption shall not apply to permit applications received after January 10, 2000, or sooner if the Executive Officer makes a determination that T-BACT is available to enable compliance with the requirements of paragraphs (d)(1), (d)(2) and (d)(3).

(H) Gasoline Transfer and Dispensing Facilities

For gasoline transfer and dispensing facilities, as defined in Rule 461 – Gasoline Transfer and Dispensing, the Executive Officer shall not, for the purposes of paragraphs (d)(1) through (d)(5),

consider the risk contribution of methyl tert-butyl ether for any gasoline transfer and dispensing permit applications deemed complete on or before December 31, 2003. If the state of California extends the phase-out requirement for methyl tert-butyl ether as an oxygenate in gasoline, the limited time exemption shall be extended to that expiration date or December 31, 2004, whichever is sooner.

(2) Contemporaneous Risk Reduction

(A) The requirements of paragraphs (d)(1) and (d)(4) shall not apply if the applicant demonstrates that a contemporaneous risk reduction resulting in a decrease in emissions will occur such that both of the following conditions are met:

(i) no receptor location will experience a total increase in MICR of greater than one in one million (1.0×10^{-6}) due to the cumulative impact of both the permit unit and the contemporaneous risk reduction; and

(ii) the contemporaneous risk reduction occurs within 100 meters of the permit unit.

T-BACT shall be used on permit units exempted under this subparagraph if the MICR from the permit unit exceeds one in one million (1.0×10^{-6}).

(B) The requirements of paragraphs (d)(2) and (d)(3) shall not apply if the applicant substantiates to the satisfaction of the Executive Officer that a contemporaneous risk reduction will occur such that any increase in individual substance acute or chronic HI from the permit unit exceeding 1.0 is mitigated with an equal or greater decrease in the same individual substance acute or chronic HI, respectively, from the contemporaneous risk reduction such that both of the following conditions are met:

(i) no receptor location will experience an increase in total acute or chronic HI of more than 1.0 due to the cumulative impact of both the permit unit and the contemporaneous risk reduction; and

(ii) the contemporaneous risk reduction occurs within 100 meters of the permit unit.

(3) Alternate Hazard Index Levels

The requirements of paragraphs (d)(2) and (d)(3) shall not apply if the applicant substantiates to the satisfaction of the Executive Officer that at all receptor locations and for every target organ system, the total chronic and acute HI level resulting from emissions from the new, modified or relocated permit unit owned or operated by the applicant for which applications were submitted on or after July 10, 1998 shall not exceed alternate HI levels which are determined by the Executive Officer in consultation with the Office of Environmental Health Hazard Assessment to be protective against adverse health effects. No alternate HI level shall exceed 10.

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
75-07-0	acetaldehyde	December 7, 1990	September 8, 1998	*(date of adoption)*
60-35-5	acetamide	January 8, 1999		
107-02-8	acrolein		June 15, 2001	August 13, 1999
79-06-1	acrylamide (or propenamide)	December 7, 1990	**	
79-10-7	acrylic acid		*	August 13, 1999
107-13-1	acrylonitrile (or vinyl cyanide)	December 7, 1990	May 3, 2002	
107-05-1	allyl chloride	January 8, 1999		
117-79-3	aminoanthraquinone, 2-	January 8, 1999		
7664-41-7	ammonia		August 18, 2000	August 13, 1999
62-53-3	aniline	January 8, 1999		
7440-38-2	**arsenic and arsenic compounds (inorganic)** including, but not limited to:		June 15, 2001	August 13, 1999
	arsenic compounds (inorganic)	December 7, 1990		August 13, 1999
7784-42-1	arsine		*	August 13, 1999
1332-21-4	asbestos	June 1, 1990		
71-43-2	benzene (including benzene from gasoline)	June 1, 1990	August 18, 2000	August 13, 1999
92-87-5	benzidine (and its salts)	December 7, 1990	**	
100-44-7	benzyl chloride	September 8, 1998	**	August 13, 1999

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
7440-41-7	beryllium and beryllium compounds	December 7, 1990	May 3, 2002	
111-44-4	bis(2-chloroethyl)ether (DCEE)	December 7, 1990		
117-81-7	bis(2-ethylhexyl)phthalate (DEHP)	September 8, 1998	**	
542-88-1	bis(chloromethyl)ether	December 7, 1990		
7789-30-2	bromine pentafluoride		*	
106-99-0	butadiene, 1,3-	December 7, 1990	June 15, 2001	
7440-43-9	cadmium and cadmium compounds	June 1, 1990	June 15, 2001	
75-15-0	carbon disulfide		May 3, 2002	August 13, 1999
56-23-5	carbon tetrachloride (or tetrachloromethane)	June 1, 1990	June 15, 2001	August 13, 1999
7782-50-5	chlorine		August 18, 2000	August 13, 1999
10049-04-4	chlorine dioxide		June 15, 2001	
95-83-0	chloro-o-phenylenediamine, 4-	January 8, 1999		
95-69-2	chloro-o-toluidine, p-	January 8, 1999		
108-90-7	chlorobenzene		June 15, 2001	
	chlorofluorocarbons			
75-43-4	dichlorodifluoromethane (CFC-12)		*	
75-69-4	trichlorofluoromethane (CFC-11)		*	
76-13-1	trichlorotrifluoroethane (CFC-113)		*	

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
67-66-3	chloroform (trichloromethane)	December 7, 1990	August 18, 2000	August 13, 1999
	Chlorophenols			
95-57-8	chlorophenol, 2-		*	
88-06-2	trichlorophenol, 2,4,6-	December 7, 1990		
	tetrachlorophenols (TECPH)		*	
87-86-5	pentachlorophenol	September 8, 1998	**	
76-06-2	chloropicrin		May 3, 2002	August 13, 1999
126-99-8	chloroprene		**	
18540-29-9	**chromium (hexavalent) and chromium compounds**	June 1, 1990	June 15, 2001	
	including, but not limited to:			
7758-97-6	lead chromate	September 8, 1998	**	
1333-82-0	chromic trioxide		June 15, 2001	
7440-50-8	copper and copper compounds		*	August 13, 1999
120-71-8	cresidine, p-	January 8, 1999		
1319-77-3	**cresols/cresylic acid (all isomers and mixture)**		June 15, 2001	
108-39-4	cresol, m-		June 15, 2001	

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
95-48-7	cresol, o-		June 15, 2001	
106-44-5	cresol, p-		June 15, 2001	
135-20-6	cupferron	January 8, 1999		
	dialkylnitrosamines			
924-16-3	nitrosodi-n-butylamine, n-	December 7, 1990		
621-64-7	nitrosodi-n-propylamine, n-	September 8, 1998		
55-18-5	nitrosodiethylamine, n-	December 7, 1990		
62-75-9	nitrosodimethylamine, n-	December 7, 1990		
10595-95-6	nitrosomethylethylamine, n-	September 8, 1998		
615-05-4	diaminoanisole, 2,4- (sulfate)	January 8, 1999		
95-80-7	diaminotoluene, 2,4-	January 8, 1999		
	dibenzo-p-dioxins (chlorinated)			
1746-01-6	tetrachlorodibenzo-p-dioxin, 2,3,7,8-	June 1, 1990	August 18, 2000	
40321-76-4	pentachlorodibenzo-p-dioxin, 1,2,3,7,8-	June 1, 1990	August 18, 2000	
39227-28-6	hexachlorodibenzo-p-dioxin, 1,2,3,4,7,8-	June 1, 1990	August 18, 2000	
57653-85-7	hexachlorodibenzo-p-dioxin, 1,2,3,6,7,8-	June 1, 1990	August 18, 2000	
19408-74-3	hexachlorodibenzo-p-dioxin, 1,2,3,7,8,9-	June 1, 1990	August 18, 2000	
35822-46-9	heptachlorodibenzo-p-dioxin,	June 1, 1990	August 18, 2000	
3268-87-9	1,2,3,4,6,7,8-	June 1, 1990	August 18, 2000	

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
41903-57-5	octachlorodibenzo-p-dioxin, 1,2,3,4,5,6,7,8-	June 1, 1990	August 18, 2000	
36088-22-9	total tetrachlorodibenzo-p-dioxin	June 1, 1990	August 18, 2000	
34465-46-8	total pentachlorodibenzo-p-dioxin	June 1, 1990	August 18, 2000	
37871-00-4	total hexachlorodibenzo-p-dioxin	June 1, 1990	August 18, 2000	
	total heptachlorodibenzo-p-dioxin			
	total dioxins, with individual isomers reported	June 1, 1990	August 18, 2000	
	total dioxins, without individual isomers reported	June 1, 1990	August 18, 2000	
	dibenzofurans (chlorinated)			
51207-31-9	tetrachlorodibenzofuran, 2,3,7,8-	June 1, 1990	August 18, 2000	
57117-41-6	pentachlorodibenzofuran, 1,2,3,7,8-	June 1, 1990	August 18, 2000	
57117-31-4	pentachlorodibenzofuran, 2,3,4,7,8-	June 1, 1990	August 18, 2000	
70648-26-9	hexachlorodibenzofuran, 1,2,3,4,7,8-	June 1, 1990	August 18, 2000	
57117-44-9	hexachlorodibenzofuran, 1,2,3,6,7,8-	June 1, 1990	August 18, 2000	
72918-21-9	hexachlorodibenzofuran, 1,2,3,7,8,9-	June 1, 1990	August 18, 2000	
60851-34-5	hexachlorodibenzofuran, 2,3,4,6,7,8-	June 1, 1990	August 18, 2000	
67562-39-4	heptachlorodibenzofuran, 1,2,3,4,6,7,8-	June 1, 1990	August 18, 2000	

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TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
55673-89-7	heptachlorodibenzofuran, 1,2,3,4,7,8,9-	June 1, 1990	August 18, 2000	
39001-02-0	octachlorodibenzofuran, 1,2,3,4,5,6,7,8	June 1, 1990	August 18, 2000	
55722-27-5	total tetrachlorodibenzofuran	June 1, 1990	August 18, 2000	
30402-15-4	total pentachlorodibenzofuran	June 1, 1990	August 18, 2000	
55684-94-1	total hexachlorodibenzofuran	June 1, 1990	August 18, 2000	
38998-75-3	total heptachlorodibenzofuran	June 1, 1990	August 18, 2000	
96-12-8	dibromo-3-chloropropane, 1,2- (DBCP)	September 8, 1998	**	
106-46-7	dichlorobenzene, 1,4- (or p-dichlorobenzene)	September 8, 1998	June 15, 2001	
91-94-1	dichlorobenzidine, 3,3	December 7, 1990		
75-34-3	dichloroethane, 1,1-	January 8, 1999		
75-35-4	dichloroethylene, 1,1-		June 15, 2001	
9901 (emittant ID)	diesel PM – diesel particulate matter from diesel-fueled internal combustion engine exhaust	March 7, 2008	March 7, 2008	
111-42-2	diethanolamine		May 3, 2002	
60-11-7	dimethylaminoazobenzene, p-	January 8, 1999		
68-12-2	dimethylformamide (N,N-)		June 15, 2001	
121-14-2	dinitrotoluene, 2,4-	December 7, 1990		
123-91-1	dioxane, 1,4- (or 1,4-diethylene dioxide)	December 7, 1990	August 18, 2000	August 13, 1999

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
106-89-8	epichlorohydrin (or 1-chloro-2,3-epoxypropane)	December 7, 1990	June 15, 2001	August 13, 1999
106-88-7	epoxybutane,1,2-		June 15, 2001	
140-88-5	ethyl acrylate		*	
100-41-4	ethyl benzene	June 5, 2009	August 18, 2000	
75-00-3	ethyl chloride (or chloroethane)		August 18, 2000	
106-93-4	ethylene dibromide (or 1,2-dibromoethane)	June 1, 1990	May 3, 2002	
107-06-2	ethylene dichloride (or 1,2-dichloroethane)	June 1, 1990	June 15, 2001	
75-21-8	ethylene oxide (or 1,2-epoxyethane)	June 1, 1990	June 15, 2001	
96-45-7	ethylene thiourea	January 8, 1999		
	Fluorides (except hydrogen fluoride, listed separately below)		*(date of adoption)*	
50-00-0	formaldehyde	December 7, 1990	August 18, 2000	August 13, 1999
	gasoline vapors		*	
111-30-8	glutaraldehyde		June 15, 2001	
	glycol ethers (and their acetates)			
107-21-1	ethylene glycol		August 18, 2000	
111-76-2	ethylene glycol butyl ether		*	August 13, 1999

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TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
110-80-5	ethylene glycol ethyl ether		August 18, 2000	February 10, 1999
111-15-9	ethylene glycol ethyl ether acetate		August 18, 2000	August 13, 1999
109-86-4	ethylene glycol methyl ether		August 18, 2000	August 13, 1999
110-49-6	ethylene glycol methyl ether acetate		August 18, 2000	
118-74-1	hexachlorobenzene	December 7, 1990	**	
608-73-1	**hexachlorocyclohexanes (mixed or technical grade)**	December 7, 1990	**	
58-89-9	hexachlorocyclohexane, gamma- (lindane)	September 8, 1998	**	
77-47-4	hexachlorocyclopentadiene		*	
110-54-3	hexane		August 18, 2000	
302-01-2	hydrazine	September 8, 1998	June 15, 2001	
122-66-7	hydrazobenzene (or 1,2-diphenylhydrazine)	December 7, 1990		
7647-01-0	hydrochloric acid (or hydrogen chloride)		August 18, 2000	August 13, 1999
7664-39-3	hydrofluoric acid (or hydrogen fluoride)		* *(date of adoption)*	August 13, 1999
10035-10-6	hydrogen bromide (HBR)		*	
74-90-8	hydrogen cyanide		August 18, 2000	August 13, 1999
7783-06-4	hydrogen sulfide		August 18, 2000	February 10, 1999
7783-07-5	hydrogen selenide			August 13, 1999

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
	isocyanates			
624-83-9	methyl isocyanate		May 3, 2002	
78-59-1	isophrone		May 3, 2002	
67-63-0	isopropyl alcohol		August 18, 2000	August 13, 1999
7439-92-1	**lead and lead compounds (inorganic, including elemental lead)** including, but not limited to:	September 8, 1998	**	
	lead compounds (inorganic)	September 8, 1998	**	
301-04-2	lead acetate	September 8, 1998	**	
7758-97-6	lead chromate	September 8, 1998	**	
7446-27-7	lead phosphate	September 8, 1998	**	
1335-32-6	lead subacetate	September 8, 1998	**	
	lead compounds (other than inorganic)	September 8, 1998	**	
108-31-6	maleic anhydride		May 3, 2002	
7439-96-5	manganese and manganese compounds		August 18, 2000	

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TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
7439-97-6	**mercury and mercury compounds (inorganic)** including, but not limited to: mercuric chloride methyl mercury		August 18, 2000 August 18, 2000 August 18, 2000	August 13, 1999
7487-94-7				
593-74-8				
67-56-1	methanol (methyl alcohol)		August 18, 2000	August 13, 1999
74-83-9	methyl bromide (or bromomethane)		August 18, 2000	August 13, 1999
71-55-6	methyl chloroform (or 1,1,1-trichloroethane)		August 18, 2000	August 13, 1999
78-93-3	methyl ethyl ketone		*	August 13, 1999
80-62-6	methyl methacrylate		*	
1634-04-4	methyl tert-butyl ether	May 2, 2003	August 18, 2000	
101-14-4	methylene bis(2-chloroaniline), 4,4- (MOCA)	January 8, 1999		
75-09-2	methylene chloride (or dichloromethane)	June 1, 1990	August 18, 2000	August 13, 1999
101-77-9	methylene dianiline, 4,4'- (and its dichloride)	September 8, 1998	May 3, 2002	
101-68-8	methylene phenyl diisocyanate		June 15, 2001	
1135	mineral fibers (other than man-made)		*	
90-94-8	michler's ketone	January 8, 1999		
7440-02-0	**nickel and nickel compounds:**	March 12, 1999	August 18, 2000	August 13, 1999

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TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
	including, but not limited to:			
373-02-4	nickel acetate	March 12, 1999	August 18, 2000	August 13, 1999
3333-67-3	nickel carbonate	March 12, 1999	August 18, 2000	August 13, 1999
13463-39-3	nickel carbonyl	March 12, 1999	August 18, 2000	August 13, 1999
12054-48-7	nickel hydroxide	March 12, 1999	August 18, 2000	August 13, 1999
1313-99-1	nickel oxide	March 12, 1999	August 18, 2000	August 13, 1999
12035-72-2	nickel subsulfide	December 7, 1990	August 18, 2000	August 13, 1999
1271-28-9	nickelocene	March 12, 1999	August 18, 2000	August 13, 1999
	refinery dust from the pyrometallurgical process	December 7, 1990	August 18, 2000	August 13, 1999
7697-37-2	nitric acid		*	August 13, 1999
98-95-3	nitrobenzene		*	
79-46-9	nitropropane, 2-		*	
759-73-9	nitroso-n-ethylurea, n-	December 7, 1990		
684-93-5	nitroso-n-methylurea, n-	December 7, 1990		
86-30-6	nitrosodiphenylamine, n-	December 7, 1990		
156-10-5	nitrosodiphenylamine, p-	September 8, 1998		
59-89-2	nitrosomorpholine, n-	January 8, 1999		

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TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
100-75-4	nitrosopiperidine, n-	January 8, 1999		
930-55-2	nitrosopyrrolidine, n-	December 7, 1990		
108171-26-2	paraffins, chlorinated (average chain length, c12; approx. 60% cl by weight)	January 8, 1999		
127-18-4	perchloroethylene (or tetrachloroethylene)	September 8, 1998	September 8, 1998	August 13, 1999
108-95-2	phenol		August 18, 2000	August 13, 1999
75-44-5	phosgene		*	August 13, 1999
7723-14-0 7803-51-2	**phosphorus and phosphorus compounds** phosphine		* February 7, 2003	
7664-38-2	phosphoric acid		August 18, 2000	
85-44-9	phthalic anhydride		June 15, 2001	
1336-36-3	**polychlorinated biphenyls (PCBs)** 3,3',4,4' Tetrachlorobiphenyl 3,4,4',5 Tetrachlorobiphenyl 2,3,3',4,4' Pentachlorobiphenyl 2,3,4,4',5 Pentachlorobiphenyl 2,3',4,4',5 Pentachlorobiphenyl 2',3,4,4',5 Pentachlorobiphenyl	December 7, 1990 March 4, 2005*** March 4, 2005*** March 4, 2005*** March 4, 2005*** March 4, 2005*** March 4, 2005***	** March 4, 2005*** March 4, 2005*** March 4, 2005*** March 4, 2005*** March 4, 2005*** March 4, 2005***	

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TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
	3,3',4,4',5 Pentachlorobiphenyl	March 4, 2005***	March 4, 2005***	
	2,3,3',4,4',5 Hexachlorobiphenyl	March 4, 2005***	March 4, 2005***	
	2,3,3',4,4',5' Hexachlorobiphenyl	March 4, 2005***	March 4, 2005***	
	2,3',4,4',5.5' Hexachlorobiphenyl	March 4, 2005***	March 4, 2005***	
	3,3',4,4',5,5' Hexachlorobiphenyl	March 4, 2005***	March 4, 2005***	
	2,3,3'4,4',5,5' Heptachlorobiphenyl	March 4, 2005***	March 4, 2005***	
	polycyclic aromatic hydrocarbons (PAHs)			
56-55-3	benz[a]anthracene	December 7, 1990		
50-32-8	benzo[a]pyrene	December 7, 1990		
205-99-2	benzo[b]fluoranthene	December 7, 1990		
205-82-3	benzo[j]fluoranthene	January 8, 1999		
207-08-9	benzo[k]fluoranthene	December 7, 1990		
218-01-9	chrysene	December 7, 1990		
226-36-8	dibenz[a,h]acridine	January 8, 1999		
224-42-0	dibenz[a,j]acridine	January 8, 1999		
53-70-3	dibenz[a,h]anthracene	December 7, 1990		
192-65-4	dibenzo[a,e]pyrene	January 8, 1999		

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
189-64-0	dibenzo[a,h]pyrene	January 8, 1999		
189-55-9	dibenzo[a,i]pyrene	January 8, 1999		
191-30-0	dibenzo[a,l]pyrene	January 8, 1999		
194-59-2	dibenzo[c,g]carbazole, 7h-	January 8, 1999		
57-97-6	dimethylbenz[a]anthracene, 7,12-	January 8, 1999		
42397-64-8	dinitropyrene, 1,6-	January 8, 1999		
42397-65-9	dinitropyrene, 1,8-	January 8, 1999		
193-39-5	indeno[1,2,3-cd]pyrene	December 7, 1990		
56-49-5	methylcholanthrene, 3-	January 8, 1999		
3697-24-3	methylchrysene, 5-	January 8, 1999		
91-20-3	naphthalene	March 4, 2005***	August 18, 2000	
602-87-9	nitroacenaphthene, 5-	January 8, 1999		
7496-02-8	nitrochrysene, 6-	January 8, 1999		
607-57-8	nitrofluorene, 2-	January 8, 1999		
5522-43-0	nitropyrene, 1-	January 8, 1999		
57835-92-4	nitropyrene, 4-	January 8, 1999		
	polycyclic aromatic hydrocarbons (PAHs), total	September 8, 1998		
7758-01-2	potassium bromate	January 8, 1999		

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
1120-71-4	propane sultone, 1,3-	January 8, 1999		
115-07-1	propylene		August 18, 2000	
107-98-2	propylene glycol methyl ether		August 18, 2000	
75-56-9	propylene oxide (or 1,2-epoxy propane)	September 8, 1998	February 23, 2000	August 13, 1999
7782-49-2	**selenium and selenium compounds** other than hydrogen selenide		May 3, 2002	
1310-73-2	sodium hydroxide		*	August 13, 1999
100-42-5	styrene (or vinyl benzene)		August 18, 2000	August 13, 1999
7664-93-9	sulfuric acid (and oleum)		May 3, 2002	August 13, 1999
79-34-5	tetrachloroethane, 1,1,2,2-	January 8, 1999		
62-55-5	thioacetamide	January 8, 1999		
108-88-3	toluene (or methyl benzene)		August 18, 2000	August 13, 1999
	toluene diisocyanates			
584-84-9	toluene-2,4-diisocyanate	September 8, 1998	June 15, 2001	
91-08-7	toluene-2,6-diisocyanate	September 8, 1998	June 15, 2001	
79-00-5	trichloroethane, 1,1,2-	January 8, 1999		
79-01-6	trichloroethylene	December 7, 1990	August 18, 2000	
121-44-8	triethylamine		February 7, 2003	August 13, 1999

TABLE I

TOXIC AIR CONTAMINANTS

CAS #	SUBSTANCE	EFFECTIVE DATE CANCER	EFFECTIVE DATE CHRONIC	EFFECTIVE DATE ACUTE
51-79-6	urethane (or ethyl carbamate)	September 8, 1998		
1314-62-1	vanadium pentoxide			August 13, 1999
108-05-4	vinyl acetate		May 3, 2002	
75-01-4	vinyl chloride (or chloroethylene)	December 7, 1990	**	August 13, 1999
75-35-4	vinylidene chloride		*	
1330-20-7	**xylenes (isomers and mixture)**		August 18, 2000	August 13, 1999
108-38-3	xylene, m-		August 18, 2000	August 13, 1999
95-47-6	xylene, o-		August 18, 2000	August 13, 1999
106-42-3	xylene, p-		August 18, 2000	August 13, 1999
7440-66-6	**zinc and zinc compounds**		*	
	including, but not limited to:			
1314-13-2	zinc oxide		*	

* Compounds not classified as carcinogenic, but have chronic risk values proposed by OEHHA that have not yet been finalized. The effective date is the date the Scientific Review Panel approves the chronic risk value, unless paragraph (e)(3) applies. Paragraph (e)(3) applies when the finalized chronic risk value differs from the value in the latest version of the Risk Assessment Procedures published pursuant to paragraph (e)(1).

** Compounds are classified as carcinogenic, but have chronic risk values proposed by OEHHA that have not yet been finalized. The effective date for use of chronic risk values is the date the Scientific Review Panel approves the chronic risk value, unless paragraph (e)(3) applies.

*** Effective date for these risk values will be March 4, 2005 or date of implementation of the applicable Risk Assessment Procedures for Rules 1401 and 212 (Version 7.0), whichever is later.

TABLE II

TOXIC AIR CONTAMINANTS WITH PROPOSED RISK VALUES

CAS #	SUBSTANCE
79-10-7	acrylic acid
107-05-1	allyl chloride
7783-20-2	ammonium sulfate
62-53-3	Aniline
1309-64-4	antimony trioxide
	arsenic compounds (other than inorganic)
532-27-4	chloroacetophenone, 2-
75-45-6	chlorodifluoromethane (HCFC-22)
7440-48-4	cobalt and cobalt compounds
74-85-1	Ethylene
96-45-7	ethylene thiourea
	fluorides and fluoride compounds
87-68-3	hexachlorobutadiene
67-72-1	hexachloroethane
822-06-0	hexamethylene-1,6-diisocyanate
78-93-3	methyl ethyl ketone (or 2-butanone)
7697-37-2	nitric acid
156-10-5	nitrosodiphenylamine, p-
7440-22-4	silver and silver compounds
96-09-3	styrene oxide
79-00-5	trichloroethane, 1,1,2-
593-60-2	vinyl bromide

APPENDIX B

FACILITIES PRIORITY SCORE ANALYSIS FOR NON–COMBUSTION SOURCES

Facilities Priority Score Analysis for Non-Combustion Sources

AER Year	Facility Name	Based on Current Toxicity Table				Based on Proposed Amended Toxicity Table			
		Res Cancer	Work Cancer	Acute	Chronic	Res Cancer	Work Cancer	Acute	Chronic
2006-07	Facility A	0.16	7.27	3.88	8.58	0.16	7.27	5.88	3.76
2006-07	Facility B	79.96	51.05	16.67	94.02	79.96	51.05	16.68	107.45
2005-06	Facility C	0.72	0.39	0.11	0.55	0.72	0.39	0.15	0.57
2006-07	Facility D	0.05	0.01	1.33	1.69	0.05	0.01	1.34	3.42
2004-05	Facility E	13.01	11.72	3.76	20.34	13.01	11.72	6.39	13.36
2005-06	Facility F	22.21	36.63	0.85	27.47	22.21	36.63	0.86	29.06
2006-07	Facility G	1.83	1.45	2.15	5.50	1.83	1.45	3.60	2.14
2004-05	Facility H	1.76	1.07	1.61	4.00	1.76	1.07	2.74	1.36
2003-04	Facility I	5.99	5.40	3.73	9.65	5.99	5.40	6.26	3.32
2005-06	Facility J	2.16	0.42	0.30	0.52	2.16	0.42	0.41	0.25
2006-07	Facility K	4.72	60.14	2.86	17.92	4.72	60.14	4.28	17.16
2004-05	Facility L	16.01	2.24	1.53	3.99	16.01	2.24	2.59	1.35
2006-07	Facility M	0.39	4.96	2.49	5.51	0.39	4.96	3.78	2.40
2005-06	Facility N	2.32	29.50	33.59	138.85	2.32	29.50	37.04	138.84
2006-07	Facility O	9.67	0.22	1.68	4.40	9.67	0.22	2.85	1.45
2005-06	Facility P	4.20	3.18	3.05	6.27	4.20	3.18	4.71	2.43
2005-06	Facility Q	0.51	2.53	3.35	5.94	0.51	2.53	5.62	2.01
2005-06	Facility R	0.21	2.64	1.58	4.12	0.21	2.64	2.67	1.41
2004-05	Facility S	4.94	17.28	7.32	9.74	4.94	17.28	9.50	4.52
2006-07	Facility T	0.12	5.86	2.10	3.40	0.12	5.86	3.17	3.11
2004-05	Facility U	3.77	2.99	1.60	4.17	3.77	2.99	2.70	1.44
2006-07	Facility V	8.08	102.86	4.82	45.90	8.08	102.86	4.82	47.97
2004-05	Facility W	166.03	23.24	2.28	5.46	166.03	23.24	3.84	1.87
2003-04	Facility X	0.98	45.95	10.23	329.94	0.98	45.95	10.84	380.60
2005-06	Facility Y	0.57	7.69	2.82	10.25	0.57	7.69	3.93	10.88
2006-07	Facility Z	0.08	0.04	0.43	0.23	0.08	0.04	0.46	0.21
2006-07	Facility AA	3659.96	512.39	60.83	107.86	3659.96	512.39	65.81	113.64
2006-07	Facility AB	2401.60	336.22	97.39	982.48	2401.60	336.22	105.79	1012.19
2006-07	Facility AC	728.46	360.57	195.94	1653.34	728.46	360.57	232.76	1828.25
2006-07	Facility AD	9.17	116.77	36.55	210.68	9.17	116.77	37.17	243.26