Attachment 1

Final Regulation Order

Proposed Amendments to the California Consumer Products Regulation

State of California
Air Resources Board

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Proposed Amendments to the Regulation for Reducing Volatile Organic Compound Emissions from Antiperspirants and Deodorants

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Proposed Amendments to the Regulation for Reducing Volatile Organic Compound Emissions from Antiperspirants and Deodorants

Note: Amendments are shown in underline to indicate additions and ~~strikeout~~ to indicate deletions from the existing regulatory text. The symbol "* * * *" means that intervening text not proposed for amendment is not shown. [Bracketed underline text] is placeholder text for these amendment's approval date.

SUBCHAPTER 8.5. CONSUMER PRODUCTS

Amend title 17, California Code of Regulations, sections 94501, 94502, and 94506 to read as follows:

Article 1. Antiperspirants and Deodorants

* * * *

§ 94501. Definitions.

For the purpose of this article, the following definitions apply:

* * * *

(e) "Executive Officer" means the Executive Officer of the California Air Resources Board~~,~~ (CARB or ARB) or ~~his or her~~their delegate.

* * * *

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, and 41712, Health and Safety Code. Reference: sections 39002, 39600, 40000, and 41712, Health and Safety Code.

§ 94502. Standards for Antiperspirants and Deodorants.

* * * *

(c) No person shall sell, supply, offer for sale, or manufacture for sale in California any antiperspirant or deodorant which contains any compound that has been identified by the CARB in Title 17, California Code of Regulations, ~~Division 3, Chapter 1, Subchapter 7, Ss~~section 93000 as a toxic air contaminant.

* * * *

§ 94506. Test Methods.

(a)

(1) Testing to determine the volatile organic compound of an antiperspirant or deodorant, or to determine compliance with the requirements of this article, shall be performed using California Air Resources Board Method 310, Determination of Volatile Organic Compounds (VOC) in Consumer Products and Reactive Organic Compounds (ROC) in Aerosol Coating Products, adopted September 25, 1997, and as last amended on ~~May 25, 2018~~August 1, 2022, which is incorporated herein by reference. Alternative methods which are shown to accurately determine the concentration of VOCs in a subject product or its emissions may be used upon approval of the Executive Officer.

(2) ~~In s~~Sections 3.4 and 3.6 of California Air Resources Board (CARB) Method 310~~,~~ describe ~~a~~the process ~~is specified~~ for the "Initial Determination of VOC Content" and the "Final Determination of VOC Content." ~~.~~ This process is an integral part of the testing procedure set forth in CARB Method 310, and is reproduced below:

Sections 3.4 and 3.6 of California Air Resources Board Method 310

3.4 Initial Determination of VOC Content.

If ~~T~~the Executive Officer makes a ~~will determine the~~ VOC content determination, they shall do so pursuant to sections 3.2 and 3.3. Only those components with concentrations equal to or greater than 0.1 percent by weight shall~~will~~ be reported.

3.4.1 Using the appropriate equation~~formula~~ specified in section 4.0, the Executive Officer shall~~will~~ make an initial determination of whether the product meets the applicable VOC standards specified in the Consumer Products Regulations, under sections 94502 and 94509~~ARB regulations~~. If initial results show that the product does not meet the applicable VOC standards, the Executive Officer may perform additional testing to confirm the initial results.

3.4.2 If the results obtained under section 3.4.1 show that the product does not meet the applicable VOC standards, the Executive Officer may~~will~~ request the responsible party ~~to~~ supply product formulation data to confirm compliance with the applicable VOC standard. The responsible party shall supply the requested information within 25 working days of the request. Information submitted to the ~~ARB~~ Executive Officer may be claimed as confidential~~;~~. The Executive Officer shall handle confidential ~~such~~ information ~~will be handled~~ in

accordance with ~~the confidentiality procedures specified in~~ Title 17, CCR, ~~Division 3, Chapter 1, Subchapter 4 (Disclosure of Public Records),~~ sections 91000 to 91022. Failure to respond to an Executive Officer request for this information is a violation.

3.4.3 ~~If the information supplied by the responsible party shows that the product does not meet the applicable VOC standards,~~ If the Executive Officer determines, based on testing, information they may receive from the responsible party, and any other applicable evidence, that the product does not comply with the applicable VOC standard,~~then~~ the Executive Officer will take appropriate enforcement action.

~~3.4.4 If the responsible party fails to provide formulation data as specified in section 3.4.2, the initial determination of VOC content under this section 3.4 shall determine if the product is in compliance with the applicable VOC standards. This determination may be used to establish a violation of ARB regulations.~~

3.6 *Final Determination of VOC Content.* If a product's compliance status is not satisfactorily resolved under section~~s~~ 3.4 and 3.5, the Executive Officer may~~will~~ conduct further analyses and testing as necessary based on the Executive Officer's scientific judgment to verify the formulation data.

~~3.6.1 If the accuracy of the supplied formulation data is verified and the product sample is determined to meet the applicable VOC standards, then no enforcement action for violation of the VOC standaonrds will be taken.~~

3.6.1~~2~~ If the Executive Officer is unable to verify the accuracy of the supplied formulation data, then the Executive Officer may ask~~will request~~ the responsible party to supply additional information to explain the discrepancy.

3.6.2~~3~~ If there exists a discrepancy that cannot be resolved between the results of Method 310 and the supplied formulation data, then the results of Method 310 shall take precedence over the supplied formulation data. The results of Method 310 shall then determine if the product is in compliance with the applicable VOC standards, and may be used to establish a violation of CARB regulations.

* * * *

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 41503.5, 41511, 41700, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39607, 39701, 40000, 41511, 41700, and 41712, Health and Safety Code.

Proposed Amendments to the Regulation for Reducing Emissions from Consumer Products

Final Regulation Order

State of California
Air Resources Board

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Final Regulation Order

Proposed Amendments to the Regulation for Reducing Emissions from Consumer Products

Note: Amendments are shown in underline to indicate additions and ~~strikeout~~ to indicate deletions from the existing regulatory text. The symbol "* * * *" means that intervening text not proposed for amendment is not shown. [Bracketed underline text] is placeholder text for these amendment's approval date.

Amend title 17, California Code of Regulations, sections 94508 through 94517 to read as follows:

Article 2. Consumer Products

* * * *

§ 94508. Definitions.

(a) For the purpose of this article, the following definitions apply:

(1) "Adhesive" means any product that is used to bond one surface to another by attachment. "Adhesive" does not include products used on humans and animals, adhesive tape, contact paper, wallpaper, shelf liners, or any other product with an adhesive incorporated onto or in an inert substrate. For "Contact Adhesive," "Construction, Panel, or Floor Covering Adhesive," and "General Purpose Adhesive" only, "Adhesive" also does not include units of product, less packaging, which weigh more than one pound and consist of more than 16 fluid ounces. This limitation does not apply to aerosol adhesives.

"Adhesive" includes the following categories (A-D):

(A) "Aerosol Adhesive" means any "Adhesive" packaged as an aerosol product in which the spray mechanism is permanently housed in a can designed for hand-held application without the need for ancillary hoses or spray equipment.

"Aerosol Adhesive" includes the following subcategories (1-3):

1. "Mist Spray Adhesive" means any "Aerosol Adhesive" which is not a "Special Purpose Spray Adhesive" and which delivers a particle or mist spray, resulting in the formation of fine, discrete particles

that yield a generally uniform and smooth application of adhesive to the substrate.

2. "Special Purpose Spray Adhesive" means an "Aerosol Adhesive" that meets one of the following definitions:

   a. "Automobile Headliner Adhesive" means an "Aerosol Adhesive" designed and labeled exclusively to bond together layers in motor vehicle headliners.

   b. "Automotive Engine Compartment Adhesive" means an "Aerosol Adhesive" designed and labeled exclusively for use in motor vehicle under-the-hood applications which require oil and plasticizer resistance, as well as high shear strength, at temperatures of 200-275 degrees Fahrenheit.

   c. "Flexible Vinyl Adhesive" means an "Aerosol Adhesive" designed and labeled exclusively to bond flexible vinyl to substrates. Flexible vinyl means a nonrigid polyvinyl chloride plastic with at least five percent, by weight, of plasticizer content. A plasticizer is a material that is incorporated into a vinyl to increase its flexibility, workability, or distensibility, that may be determined using ASTM Method E260-91 (Jan. 25, 1991) Standard Practice for Packed Column Gas Chromatography, which is incorporated by reference herein, or from product formulation data.

   d. "Laminate Repair/Edgebanding Adhesive" means an "Aerosol Adhesive" designed and labeled exclusively for:

      i. the touch-up or repair of items laminated with high pressure laminates (for example, lifted edges, delaminations, etc.), or for

      ii. the touch-up, repair, or attachment of edgebanding materials, including, but not limited to, other laminates, synthetic marble, veneers, wood molding, or decorative metals.

      For the purposes of this definition "high pressure laminate" means sheet materials which consist of paper, fabric, or other core material that have been laminated at temperatures exceeding 265 degrees F, and at pressures between 1,000 and 1,400 psi.

e. “Mounting Adhesive” means an “Aerosol Adhesive” designed and labeled exclusively to permanently mount photographs, artwork, or any other drawn or printed media to a backing (paper, board, cloth, etc.) without causing discoloration to the artwork.

f. "Plastic Pipe Adhesive" means an "Aerosol Adhesive" labeled exclusively to bond segments of acrylonitrile butadiene styrene (ABS), polyvinyl chloride (PVC), or chlorinated polyvinyl chloride (CPVC) pipe together.

~~f~~g. “Polyolefin Adhesive” means an “Aerosol Adhesive” designed and labeled exclusively to bond polyolefins (for example, polyethylene, polypropylene, etc.) to substrates.

~~g~~h. “Polystyrene Foam Adhesive” means an “Aerosol Adhesive” designed and labeled exclusively to bond polystyrene foam (for example, Styrofoam®, expanded polystyrene foam, etc.) to substrates.

~~h~~i. “Screen Printing Adhesive” means an “Aerosol Adhesive” designed and labeled exclusively to hold garments or fabric in place during the screen printing process.

3. “Web Spray Adhesive” means any “Aerosol Adhesive” which is not a “Mist Spray Adhesive” or “Special Purpose Spray Adhesive.”

* * * *

(6) “Air Freshener” means any product including, but not limited to, liquids, semisolids, solids, aerosol or pump sprays, wicks, wipes, diffusers, powders, or crystals, designed or labeled for the purpose of masking odors, or freshening, cleaning, scenting, or deodorizing the air. “Air Freshener” does not include products that are used on the human body, products that function primarily as cleaning products as indicated on a product label, “Odor Remover/Eliminator,” or “Toilet/Urinal Care Product.”

(A) For products manufactured before January 1, 2023, “Air Freshener” includes the following subcategories (~~A-C~~1-3):

~~(A)~~1. “Double Phase Aerosol Air Freshener” means an aerosol “Air Freshener,” with the liquid contents in two or more distinct phases, that requires the product container be shaken before use to mix the phases, producing an emulsion.

~~(B)~~2. "Dual Purpose Air Freshener/Disinfectant" means an aerosol "Air Freshener" that is designed or labeled for use as both a "Disinfectant" and an "Air Freshener," or is so represented on any sticker, label, packaging, or literature attached to the product container.

~~(C)~~3. "Single Phase Aerosol Air Freshener" means an aerosol "Air Freshener" with the liquid contents in a single homogeneous phase which does not require that the product container be shaken before use.

(B) For products manufactured on or after January 1, 2023, "Air Freshener" includes the following subcategories (1-5):

1. "Automatic Aerosol Air Freshener" is an aerosol "Air Freshener" that is labeled to be used in an "Automatic Air Freshening Dispenser."

   For the purposes of this subsection, "Automatic Air Freshening Dispenser" means a device labeled to dispense an "Automatic Aerosol Air Freshener" at a predetermined time or interval of time, under preset conditions, and/or due to sensor activation.

2. "Concentrated Aerosol Air Freshener" is a "Manual Aerosol Air Freshener" enclosed under pressure which (1) contains 15 percent or more fragrance, (2) is designed with a valve that permits the dispensing of no more than 185 microliters of product upon each activation, and (3) is sold in aerosol containers of two ounces or less by weight.

3. "Dual Purpose Air Freshener/Disinfectant" means an aerosol "Air Freshener" that is designed or labeled for use as both a "Disinfectant" and an "Air Freshener," or is so represented on any sticker, label, packaging, or literature attached to the product container.

4. "Manual Aerosol Air Freshener" means an aerosol "Air Freshener" that is designed or labeled to be handheld and/or manually activated. A "Manual Aerosol Air Freshener" is not a "Concentrated Aerosol Air Freshener" or a "Total Release Aerosol Air Freshener" or a "Dual Purpose Air Freshener/Disinfectant."

5. "Total Release Aerosol Air Freshener" is an aerosol air freshener product enclosed under pressure which (1) dispenses all or most of its contents during a single application, and (2) is sold in containers of five ounces or less by weight.

* * * *

(19) "Automotive Windshield Washer Fluid" means any liquid dilutable or premixed product that is designed or labeled for use in a motor vehicle windshield washer fluid system either as an anti-freeze or for the purpose of cleaning, washing, bug removal, or wetting the windshield(s). "Automotive Windshield Washer Fluid" does not include any fluid which is placed in a new motor vehicle at the time the vehicle is manufactured.

For the purpose of complying with the requirements for "Automotive Windshield Washer Fluid," the following definitions (A-D) apply:

* * * *

(D) "Type "A" area" means:

(1) Before July 1, 2013, the following regions of California: Del Norte, Shasta, and Trinity Counties; the Great Basin Valley, Lake Tahoe, Mountain Counties and Northeast Plateau Air Basins, as defined in title 17, California Code of Regulations, sections 60105, 60108, 60111, and 60113.

(2) On and after July 1, 2013, the counties listed in Table 94508(a)(~~20~~19)(A), and areas defined by ZIP codes listed in Table 94508(a)(~~20~~19)(B) below:

Table 94508(a)(~~20~~19)(A) Counties that are Type "A" Areas

Air Basin	Counties
Great Basin Valleys	Alpine, Inyo, Mono
Lake Tahoe	El Dorado
Mountain Counties	Amador, Calaveras, El Dorado, Mariposa, Nevada, Plumas, Sierra, Tuolumne
Northeast Plateau	Lassen, Modoc, Siskiyou
North Coast	Del Norte, Trinity
Sacramento Valley	Shasta

Table 94508(a)(~~2019~~)(B) Type "A" Areas Identified by ZIP Code

County*	ZIP Code	County*	ZIP Code	County*	ZIP Code
Butte	95954	Placer	95703	San Bernardino	92315
Butte/Tehama	95942	Placer	95713	San Bernardino	92317
Fresno	00017	Placer	95714	San Bernardino	92321
Fresno	93621	Placer	95715	San Bernardino	92325
Fresno	93628	Placer	95717	San Bernardino	92339
Fresno	93664	Placer	95722	San Bernardino	92352
Fresno/Tulare	93633	Placer	95724	San Bernardino	92358
Glenn	00047	Placer	96140	San Bernardino	92382
Humboldt	00050	Placer	96141	San Bernardino	92385
Kern	00016	Placer	96142	San Bernardino	92397
Kern	93255	Placer	96143	San Diego	91962
Kern	93285	Placer	96145	Santa Barbara	00032
Kern/Ventura	93225	Placer	96146	Tehama	00037
Kern	93226	Placer	96148	Tehama	00038
Kern/Ventura/ Santa Barbara/ San Luis Obispo	93252	Placer	96161	Tehama	96063
Madera	00020	Placer	96162	Tulare	00026
Madera	93643	Riverside	92549	Tulare	93260
Madera	93644	Riverside	92561	Tulare	93262
Placer	95602 (portion)**	San Bernardino	91759	Tulare	93265
Placer	95603 (portion)**	San Bernardino	92256	Tulare	93271
Placer	95631 (portion)**	San Bernardino	92305		
Placer	95701	San Bernardino	92314		

* County name is provided as a point of reference only. Except as specified for ZIP codes 95602, 95603, and 95631, all portions of the identified ZIP codes are Type "A" areas.

** Only the portion of ZIP codes 95602, 95603, and 95631 that lie to the east of Range 9 east, Mount Diablo Baseline and Meridian.

* * * *

(36) "Dry Shampoo" means a product labeled to be applied to hair and massaged or brushed/combed through the hair for the purpose of cleaning the hair without needing to be rinsed.

(~~36~~37) "Dusting Aid" means a product designed or labeled to assist in removing dust and other soils from floors and other surfaces without leaving a wax

or silicone based coating. "Dusting Aid" does not include "Pressurized Gas Duster."

(~~37~~38) "Electrical Cleaner" means a product labeled to remove heavy soils such as grease, grime, or oil from electrical equipment, including, but not limited to, electric motors, armatures, relays, electric panels, or generators. Electrical Cleaner does not include "General Purpose Cleaner," "General Purpose Degreaser," "Dusting Aid," "Electronic Cleaner," "Energized Electrical Cleaner," "Pressurized Gas Duster," "Engine Degreaser," "Anti-Static Product," or products designed to clean the casings or housings of electrical equipment.

(~~38~~39) "Electronic Cleaner" means a product labeled for the removal of dirt, moisture, dust, flux, or oxides from the internal components of electronic or precision equipment such as circuit boards, and the internal components of electronic devices, including but not limited to, radios, compact disc (CD) players, digital video disc (DVD) players, and computers. "Electronic Cleaner" does not include "General Purpose Cleaner," "General Purpose Degreaser," "Dusting Aid," "Pressurized Gas Duster," "Engine Degreaser," "Electrical Cleaner," "Energized Electrical Cleaner," "Anti-Static Product," or products labeled to clean the casings or housings of electronic equipment. "Electronic Cleaner" does not include any product that meets both of the following criteria:

1) the product is labeled to clean and/or degrease electronic equipment, where cleaning and/or degreasing is accomplished when electrical current exists, or when there is a residual electrical potential from a component;

2) the product label clearly displays the statements: "Energized Electronic Equipment use only."

(~~39~~40) "Energized Electrical Cleaner" means a product that meets ~~both of~~ the following criteria:

~~1)~~ (A) the product is labeled to clean and/or degrease electrical equipment, where cleaning and/or degreasing ~~is accomplished~~ can only be performed when electrical current exists, or when there is a residual electrical potential from a component such as a capacitor;

~~2)~~ (B) the product label clearly displays the statements: "Energized Equipment use only. Not to be used for motorized vehicle maintenance, or their parts;" and

~~3)~~ (C) "Energized Electrical Cleaner" does not include

1. "Electronic Cleaner;" or

2. Products manufactured on or after January 1, 2023, that are sold to "Automotive Maintenance Facilities" or "Automotive Repair Facilities," as defined in California Code of Regulations, title 17, section 93111(c)(4).

~~"Energized Electrical Cleaner" does not include "Electronic Cleaner."~~

(~~40~~41) "Engine Degreaser" means a cleaning product designed or labeled to remove grease, grime, oil and other contaminants from the external surfaces of engines and other mechanical parts.

(~~41~~42) "Executive Officer" means the Executive Officer of the California Air Resources Board (CARB or ARB)~~,~~ or ~~his or her~~their delegate.

(~~42~~43) "Existing Product" means any formulation of the same product category and form sold, supplied, manufactured, or offered for sale in California prior to the following dates, or any subsequently introduced identical formulation:

(A) October 21, 1991, for all products listed in section 94509(a) that have initial effective dates of January 1, 1993, or January 1, 1994;

(B) January 6, 1993, for all products listed in section 94509(a) that have initial effective dates of January 1, 1995, or January 1, 1997, and charcoal lighter materials subject to section 94509(h);

(C) August 16, 1998, for all products listed in section 94509(a) that have initial effective dates of January 1, 2001, January 1, 2002, January 1, 2003, or January 1, 2005;

(D) November 19, 2000, for all products in the following product categories listed in section 94509(a): "Nonaerosol General Purpose Degreaser," "Sealant and Caulking Compound," and "Tire Sealant and Inflator."

(E) July 20, 2005, for all products listed in section 94509(a) that have an effective date of December 31, 2006, December 31, 2008, or December 31, 2009; and

(F) December 8, 2007, for all products listed in section 94509(a) that have an initial effective date of December 31, 2008, or December 31, 2010 for Brake Cleaner, Carburetor or Fuel-Injection Air Intake Cleaner, Aerosol Engine Degreaser, Resilient Flooring Material, Nonresilient Flooring Material, Aerosol General Purpose Degreaser, and Aerosol Temporary Hair Color.

(G) July 18, 2009, for all products listed in section 94509(a) that have an initial effective date of December 31, 2010, or December 31, 2012, December 31, 2013, or December 31, 2014.

(H) October 20, 2010, for "Multi-purpose Solvent" and "Paint Thinner."

(I) December 10, 2011, for "Anti-Seize Lubricant;" "Cutting or Tapping Oil;" "Gear, Chain, or Wire Lubricant;" and "Rust Preventative or Rust Control Lubricant."

(~~43~~44) "Fabric Protectant" means a product designed or labeled to be applied to fabric substrates to protect the surface from soiling from dirt or other impurities or to reduce absorption of liquid into the fabric's fibers. "Fabric Protectant" does not include "Waterproofer;" products labeled for use solely on leather; pigmented products that are designed or labeled to be used primarily for coloring; products used for construction, reconstruction, modification, structural maintenance or repair of fabric substrates; or products that renew or restore fabric. "Fabric Protectant" also does not include "Clear Coating" or "Vinyl/Fabric/Leather/Plastic Coating" as defined in section 94521(a).

(~~44~~45) "Fabric Refresher" means a product labeled to neutralize or eliminate odors on nonlaundered fabric including, but not limited to, soft household surfaces, rugs, carpeting, draperies, bedding, automotive interiors, footwear, athletic equipment, clothing and/or on household furniture or objects upholstered or covered with fabrics such as, but not limited to, wool, cotton, or nylon. "Fabric Refresher" does not include "Anti-static Product," "Carpet/Upholstery Cleaner," "Footwear or Leather Care Product," "Spot Remover," or "Disinfectant," or products labeled for application to both fabric and human skin.

(~~45~~46) "Fabric Softener-Single Use Dryer Product" means a laundry care product designed or labeled for single use in the clothes dryer to impart softness to, or control static cling of, a load of washable fabrics; and may impart a fragrance or scent. For the purpose of this definition only, "single use" means a product that is intended for one time use during a single drying cycle and is removed after completion of the drying cycle. A "load" is the amount of washable fabrics in a single drying cycle. "Fabric Softener-Single Use Dryer Product" includes treated nonwoven sheets which are typically packaged in boxes with a multiple number of sheets. "Fabric Softener-Single Use Dryer Product" does not include products applied to washable fabrics prior to placing the washable fabrics in the clothes dryer.

(~~46~~47) "Facial Cleaner or Soap" means a cleaner or soap designed primarily to clean the face. "Facial Cleaner or Soap" includes, but is not limited to, facial cleansing creams, semisolids, liquids, lotions, and substrate-impregnated forms. "Facial Cleaner or Soap" does not include prescription drug products, "Antimicrobial Hand or Body Cleaner or Soap," "Astringent/Toner," "General-use Hand or Body Cleaner or Soap," "Medicated Astringent/Medicated Toner," or "Rubbing Alcohol."

(~~47~~48) "Fat Wood" means pieces of wood kindling with high naturally-occurring levels of sap or resin which enhance ignition of the kindling. "Fat wood" does not include any kindling with substances added to enhance flammability, such as wax-covered or wax-impregnated wood-based products.

(~~48~~49) "Floor Coating" means an opaque coating that is labeled and designed for application to flooring, including but not limited to, decks, porches, steps, and other horizontal surfaces which may be subject to foot traffic.

(~~49~~50) "Floor Maintenance Product" means any product designed or labeled to restore, maintain, or enhance a previously applied floor finish. "Floor Maintenance Product" includes, but is not limited to, products that are labeled as Spray Buff products or Floor Maintainers or Restorers. "Floor Maintenance Product" does not include floor polish products, products designed solely for the purpose of cleaning, products designed or labeled exclusively for use on marble floors, or coatings subject to architectural coatings regulations.

(~~50~~51) "Floor Polish or Wax" means a product designed or labeled to polish, wax, condition, protect, temporarily seal, or otherwise enhance floor surfaces by leaving a protective finish that is designed or labeled to be periodically replenished. "Floor Polish or Wax" does not include "Floor Maintenance Products," "Floor Wax Stripper," or coatings subject to architectural coatings regulations.

"Floor Polish or Wax" is divided into three subcategories: products for resilient flooring materials, products for nonresilient flooring materials and wood floor wax. For the purposes of this article:

(A) "Resilient Flooring Material" means flexible flooring material including but is not limited to, asphalt, cork, linoleum, no-wax, rubber, seamless vinyl, and vinyl composite flooring.

(B) "Nonresilient Flooring Material" means flooring of a mineral content which is not flexible. "Nonresilient Flooring material" includes but is not limited to terrazzo, marble, slate, granite, brick, stone, ceramic tile, and concrete.

(C) "Wood Floor Wax" means any wax-based product~~s~~ designed or labeled for use solely on wood floors. "Wood Floor Wax" does not include products that make the claim to "clean and wax" or "clean and polish."

(~~51~~52) "Floor Seam Sealer" means any product designed and labeled exclusively for bonding, fusing, or sealing (coating) seams between adjoining rolls of installed flexible sheet flooring.

(~~52~~53) "Floor Wax Stripper" means a product designed to remove natural or synthetic floor polishes or waxes through breakdown of the polish or wax polymers, or by dissolving or emulsifying the polish or wax. "Floor Wax Stripper" does not include aerosol floor wax strippers or products designed to remove floor wax solely through abrasion.

(~~53~~54) "Footwear or Leather Care Product" means any product designed or labeled to be applied to footwear or to other leather articles/components, to maintain, enhance, clean, protect, or modify the appearance, durability, fit, or flexibility of the footwear or leather article/component. Footwear includes both leather and nonleather foot apparel. "Footwear or Leather Care Product" does not include "Fabric Protectant," "General Purpose Adhesive," "Contact Adhesive," "Vinyl/Fabric/Leather/Plastic Coating," as defined in section 94521(a), "Rubber/Vinyl Protectant," "Fabric Refresher," products solely for deodorizing, or sealant products with adhesive properties used to create external protective layers greater than 2 millimeters thick.

(~~54~~55) "Fragrance" means a substance or complex mixture of aroma chemicals, natural essential oils, and other functional components with a combined vapor pressure not in excess of 2 mm of Hg at 20^{O}C, the sole purpose of which is to impart an odor or scent, or to counteract a malodor.

(~~55~~56) "Furniture Maintenance Product" means a wax, polish, conditioner, or any other product labeled for the purpose of polishing, protecting or enhancing finished wood surfaces other than floors , and other furniture surfaces including but not limited to acrylics, ceramic, plastics, stone surfaces, metal surfaces, and fiberglass. "Furniture Maintenance Product" does not include "Dusting Aid," "Wood Cleaner," and products designed solely for the purpose of cleaning, or products designed to leave a permanent finish such as stains, sanding sealers and lacquers.

(~~56~~57) "Furniture Coating" means any paint designed for application to room furnishings including, but not limited to, cabinets (kitchen, bath and vanity), tables, chairs, beds, and sofas.

(~~57~~58) "Gel" means a colloid in which the disperse phase has combined with the continuous phase to produce a semisolid material, such as jelly.

(~~58~~59) "General Purpose Cleaner" means:

(A) for products manufactured before January 1, 2015: a product labeled to clean a variety of hard surfaces. "General Purpose Cleaner" includes, but is not limited to, products designed or labeled for general floor cleaning, kitchen, countertop, or sink cleaning, and cleaners designed or labeled to be used on a variety of hard surfaces such as stovetops, cooktops, or microwaves.

(B) for products manufactured on or after January 1, 2015: a product that is designed or labeled to clean hard surfaces in homes, garages, patios, commercial, or institutional environments. "General Purpose Cleaner" includes products that clean kitchens, sinks, appliances, counters, walls, cabinets or floors and products that claim to clean a variety of similar surfaces such as plastics, stone or metal. "General Purpose Cleaner" does not include "Single Purpose Cleaner" or "Furniture Maintenance Product."

(~~59~~60) "General Purpose Degreaser" means:

(A) for products manufactured before December 31, 2012: any product labeled to remove or dissolve grease, grime, oil and other oil-based contaminants from a variety of substrates, including automotive or miscellaneous metallic parts. "General Purpose Degreaser" does not include "Engine Degreaser," "General Purpose Cleaner," "Adhesive Remover," "Electronic Cleaner," "Electrical Cleaner," "Energized Electrical Cleaner," and "Metal Polish or Cleanser." "General Purpose Degreaser" also does not include products used exclusively in "solvent cleaning tanks or related equipment," or products that are (A) sold exclusively to establishments which manufacture or construct goods or commodities; and (B) labeled "not for retail sale." "Solvent cleaning tanks or related equipment" includes, but is not limited to, cold cleaners, vapor degreasers, conveyorized degreasers, film cleaning machines, or products designed to clean miscellaneous metallic parts by immersion in a container.

(B) for products manufactured on or after December 31, 2012, but before January 1, 2015: any product labeled to remove or dissolve grease, grime, oil and other oil-based contaminants from a variety of substrates, including automotive or miscellaneous metallic parts. "General Purpose Degreaser" does not include "Adhesive Remover," "Electrical Cleaner," "Electronic Cleaner," "Energized Electrical Cleaner," "Engine Degreaser," "General Purpose Cleaner,"

"Metal Polish or Cleanser," or "Oven or Grill Cleaner." "General Purpose Degreaser" also does not include products used exclusively in "solvent cleaning tanks or related equipment," or products that are (A) exclusively sold directly or through distributors to establishments which manufacture or construct goods or commodities; and (B) labeled exclusively for "use in the manufacturing process only." "Solvent cleaning tanks or related equipment" includes, but is not limited to, cold cleaners, vapor degreasers, conveyorized degreasers, film cleaning machines, or products designed to clean miscellaneous metallic parts by immersion in a container.

(C) for products manufactured on or after January 1, 2015: any product that is designed or labeled to remove or dissolve grease, grime, oil or other oil-based contaminants from a variety of substrates, including automotive or miscellaneous metallic parts. "General Purpose Degreaser" does not include "Adhesive Remover," "Electrical Cleaner," "Electronic Cleaner," "Energized Electrical Cleaner," "Engine Degreaser," "General Purpose Cleaner," "Metal Polish or Cleanser," "Oven or Grill Cleaner," or "Single Purpose Degreaser." "General Purpose Degreaser" also does not include products used exclusively in "solvent cleaning tanks or related equipment," or products that are (A) exclusively sold directly or through distributors to establishments which manufacture or construct goods or commodities; and (B) labeled exclusively for "use in the manufacturing process only." "Solvent cleaning tanks or related equipment" includes, but is not limited to, cold cleaners, vapor degreasers, conveyorized degreasers, film cleaning machines, or products designed to clean miscellaneous metallic parts by immersion in a container.

(~~60~~61) "General-use Hand or Body Cleaner or Soap" means a cleaner or soap designed to be used routinely on the skin to clean or remove typical or common dirt and soils. "General-use Hand or Body Cleaner or Soap" includes, but is not limited to, hand or body washes, dual-purpose shampoo-body cleaners, shower or bath gels, and moisturizing cleaners or soaps. "General-use Hand or Body Cleaner or Soap" does not include prescription drug products, "Antimicrobial Hand or Body Cleaner or Soap," "Astringent/Toner," "Facial Cleaner or Soap," "Hand Dishwashing Detergent" (including antimicrobial), "Heavy-duty Hand Cleaner or Soap," "Medicated Astringent/Medicated Toner," or "Rubbing Alcohol."

(~~61~~62) "Glass Cleaner" means a cleaning product designed or labeled primarily for cleaning surfaces made of glass. "Glass Cleaner" does not include products designed or labeled solely for the purpose of cleaning optical

materials used in eyeglasses, photographic equipment, scientific equipment and photocopying machines.

(~~62~~63) "Global Warming Potential (GWP)" means the radiative forcing impact of one mass-based unit of a given greenhouse gas relative to an equivalent unit of carbon dioxide over a given period of time.

(~~63~~64) "Global Warming Potential Value" or "GWP Value" means the global warming potential value of a chemical or compound as specified in the IPCC: 1995 Second Assessment Report (SAR), Table 2.14, in Climate Change 2007: The Physical Sciences Basis. Contribution of Working Group I to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change, which is incorporated by reference herein.

If Table 2.14 does not contain a SAR 100-year GWP Value for a specific chemical or compound, then the 100-year GWP Value in Table 2.14 for that chemical or compound shall be used. If there is no 100-year GWP Value for a chemical or compound listed in Table 2.14 or GWP Value listed in Table 2.15, then the GWP Value is assumed to be equal to the GWP limit of the applicable product category.

(~~64~~65) "Graffiti Remover" means a product labeled to remove spray paint, ink, marker, crayon, lipstick, nail polish, or shoe polish, from a variety of noncloth or nonfabric substrates. "Graffiti Remover" does not include "Paint Remover or Stripper," "Nail Polish Remover," or "Spot Remover." Products labeled for dual use as both a paint stripper and graffiti remover are considered "Graffiti Removers."

(~~65~~66) "Gum or Candle Wax Remover" means a product designed or labeled exclusively to remove chewing gum and/or candle wax from soft surfaces such as carpet, rugs, upholstery, or fabric.

(~~66~~67) "Hair Finishing Spray" means a ~~consumer~~ product that is ~~designed or~~labeled for application to ~~styled~~hair ~~to provide sufficient rigidity, to hold, retain or finish the style of the hair for a period of time~~once styling is complete~~. "Hair Finishing Spray"~~ and includes ~~aerosol hair sprays, pump hair sprays, spray waxes; color, glitter, or sparkle hair sprays that make finishing claims; and~~ products that are labeled for both ~~a~~hair styling and finishing ~~product~~. "Hair Finishing Spray" does not include ~~spray~~products labeled for hair~~that are intended to aid in~~ styling but~~do~~ not~~provide~~ labeled for finishing ~~of a~~ the hair style.

For the purposes of this category, "finish" or "finishing" means the maintaining and/or holding of ~~previously styled hair for a period of time~~ a hairstyle once all styling is complete.

For the purposes of this category, "styling" means ~~the~~ forming, sculpting, or manipulating the hair to ~~temporarily~~ alter the hair's shape.

(~~67~~68) "Hair Mousse" means a hairstyling foam designed to facilitate styling of a coiffure and provide limited holding power.

(~~68~~69) "Hair Shine" means any product ~~designed~~labeled for the primary purpose of creating a shine when applied to the hair. "Hair Shine" includes, but is not limited to, dual-use products designed primarily to impart a sheen to the hair. "Hair Shine" does not include "Hair Finishing Spray," "Hair Mousse," or "Hair Styling Product.~~" or products whose primary purpose is to condition or hold the hair.~~

(~~69~~70) "Hair Styling Product" means a consumer product that is designed or labeled for application to wet, damp or dry hair to aid in defining, shaping, lifting, styling and/or sculpting of the hair. "Hair Styling Product" includes, but is not limited to, hair balm, clay, cream, creme, curl straightener, gel, liquid, lotion, paste, pomade, putty, root lifter, serum, spray gel, stick, temporary hair straightener, wax, spray products that aid in styling but do not provide finishing of a hair style, and leave-in volumizers, detanglers and/or conditioners that make styling claims. "Hair Styling Product" does not include "~~No Rinse~~Dry Shampoo," "Thermal Protectant," "Hair Mousse," "Hair Shine," "Hair Finishing Spray," or shampoos or conditioners that are rinsed from the hair prior to styling.

For the purposes of this ~~category~~subchapter, "finish" or "finishing" means the maintaining and/or holding of~~previously styled hair for a period of time~~ a hairstyle once all styling is complete.

For the purposes of this ~~category~~subchapter, "styling" means ~~the~~forming, sculpting, or manipulating the hair to~~temporarily~~ alter the hair's shape.

(~~70~~71) "Heavy-Duty Hand Cleaner or Soap" means a product designed to clean or remove difficult dirt and soils such as oil, grease, grime, tar, shellac, putty, printer's ink, paint, graphite, cement, carbon, asphalt, or adhesives from the hand with or without the use of water. "Heavy-duty Hand Cleaner or Soap" does not include prescription drug products, "Antimicrobial Hand or Body Cleaner or Soap," "Astringent/Toner," "Facial Cleaner or Soap," "General-use Hand or Body Cleaner or Soap," "Medicated Astringent/Medicated Toner" or "Rubbing Alcohol."

(~~71~~72) "Herbicide" means a pesticide product designed to kill or retard a plant's growth, but excludes products that are: (A) for agricultural use, or (B) restricted materials that require a permit for use and possession.

(~~72~~73) "High-Temperature Coating" means a high performance coating labeled and formulated for application to substrates exposed continuously or intermittently to temperatures above 204°C (400°F).

(~~73~~74) "Household Product" means any consumer product that is primarily designed to be used inside or outside of living quarters or residences that are occupied or intended for occupation by individuals, including the immediate surroundings.

(~~74~~75) "Industrial Maintenance Coating" means a high performance architectural coating, including primers, sealers, undercoaters, intermediate coats, and topcoats formulated for application to substrates, including floors, exposed to one or more of the following extreme environmental conditions listed below and labeled "For industrial use only;" "For professional use only;" "Not for residential use;" or "Not intended for residential use."

(A) Immersion in water, wastewater, or chemical solutions (aqueous and nonaqueous solutions), or chronic exposure of interior surfaces to moisture condensation; or

(B) Acute or chronic exposure to corrosive, caustic or acidic agents, or to chemicals, chemical fumes, or chemical mixtures or solutions; or

(C) Frequent exposure to temperatures above 121°C (250°F); or

(D) Frequent heavy abrasion, including mechanical wear and frequent scrubbing with industrial solvents, cleansers, or scouring agents; or

(E) Exterior exposure of metal structures and structural components.

(~~75~~76) "Insecticide" means a pesticide product that is designed for use against insects or other arthropods, but excluding products that are: for agricultural use, or for a use which requires a structural pest control license under Chapter 14 (commencing with Section 8500) of the Business and Professions Code, or restricted materials that require a permit for use and possession.

"Insecticide" includes the following subcategories (A-~~F~~G):

(A) "Bed Bug Insecticide" means any insecticide product that is designed for use against the adult, nymph, or eggs of insects that belong to the family Cimicidae and the genus Cimex, which includes species such as Cimex lectularius (Common Bed Bugs) and Cimex hemipterus (Tropical Bed Bugs.)

(~~A~~B) "Crawling Bug Insecticide" means any insecticide product that is designed for use against ants, cockroaches, or other household crawling arthropods, such as mites, silverfish or spiders. "Crawling Bug Insecticide" does not include products designed to be used exclusively on humans or animals, or any house dust mite product. For the purposes of this definition only:

"House dust mite product" means a product whose label, packaging, or accompanying literature states that the product is suitable for use against house dust mites, but does not indicate that the product is suitable for use against ants, cockroaches, or other household crawling arthropods.

"House dust mite" means mites which feed primarily on skin cells shed in the home by humans and pets and which belong to the phylum Arthropoda, the subphylum Chelicerata, the class Arachnida, the subclass Acari, the order Astigmata, or the family Pyroglyphidae.

(~~B~~C) "Flea or Tick Insecticide" means any insecticide product that is designed for use against fleas, ticks, their larvae, or their eggs. "Flea or Tick Insecticide" does not include products that are designed to be used exclusively on humans or animals or their bedding.

(~~C~~D) "Flying Bug Insecticide" means any insecticide product that is designed for use against flying insects or other flying arthropods such as flies, mosquitoes, moths, or gnats. "Flying Bug Insecticide" does not include "Wasp or Hornet Insecticide," products that are designed to be used exclusively on humans or animals, or any moth-proofing product. For the purposes of this definition only, "moth-proofing product" means a product whose label, packaging, or accompanying literature indicates that the product is designed to protect fabrics from damage by moths, but does not indicate that the product is suitable for use against flying insects or other flying arthropods.

(~~D~~E) "Insecticide Fogger" means any insecticide product designed to release all or most of its content, as a fog or mist, into indoor areas during a single application.

(~~E~~F) "Lawn or Garden Insecticide" means an insecticide product labeled primarily to be used in household lawn or garden areas to protect plants from insects or other arthropods. Notwithstanding the requirements of section 94512(a) aerosol "Lawn or Garden Insecticide" may claim to kill insects or other arthropods.

(~~F~~G) "Wasp or Hornet Insecticide" means any insecticide product that is designed for use against wasps, hornets, yellow jackets or bees by allowing the user to spray from a distance a directed stream or burst at the intended insects, or their hiding place.

(~~77~~78) "Institutional Product" or "Industrial and Institutional (I&I) Product" means a consumer product that is designed for use in the maintenance or operation of an establishment that: (A) manufactures, transports, or sells goods or commodities, or provides services for profit; or (B) is engaged in the nonprofit promotion of a particular public, educational, or charitable cause. "Establishments" include, but are not limited to, government agencies, factories, schools, hospitals, sanitariums, prisons, restaurants, hotels, stores, automobile service and parts centers, health clubs, theaters, or transportation companies. "Institutional Product" does not include household products and products that are incorporated into or used exclusively in the manufacture or construction of the goods or commodities at the site of the establishment.

(~~78~~79) "Label" means any written, printed, or graphic matter affixed to, applied to, attached to, blown into, formed, molded into, embossed on, or appearing upon any consumer product or consumer product package, for purposes of branding, identifying, or giving information with respect to the product or to the contents of the package.

(~~79~~80) "Laundry Prewash" means a product that is designed for application to a fabric prior to laundering in a wet-cleaning process, and that supplements and contributes to the effectiveness of laundry detergents and/or provides specialized performance.

(~~80~~81) "Laundry Starch/Sizing/Fabric Finish Product" means a product that is labeled for application to a fabric, either during or after laundering, to impart and prolong a crisp, fresh look and may also act to help ease ironing of the fabric. "Laundry Starch/Sizing/Fabric Finish Product" includes, but is not limited to, starch, sizing, and fabric finish.

(~~81~~82) "Liquid" means a substance or mixture of substances which is capable of a visually detectable flow as determined under ASTM D-4359-90 (May 25, 1990) Standard Test Method for Determining Whether a Material Is a Liquid or a Solid, which is incorporated by reference herein. "Liquid" does not include powders or other materials that are composed entirely of solid particles.

(~~82~~83) "Lubricant" means:

(A) for products manufactured before December 31, 2012: a product that reduces friction, heat, noise, or wear between moving parts, or

loosens rusted or immovable parts or mechanisms. "Lubricant" does not include automotive power steering fluids; products designed and labeled exclusively to release manufactured products from molds; products for use inside power generating motors, engines, and turbines, and their associated power-transfer gearboxes; two cycle oils or other products designed to be added to fuels; products for use on the human body or animals; or products that are (1) sold exclusively to establishments which manufacture or construct goods or commodities, and (2) labeled "not for retail sale."

(B) for products manufactured on or after December 31, 2012: a product that reduces friction, heat, noise, or wear between moving parts, or loosens rusted or immovable parts or mechanisms. "Lubricant" does not include automotive power steering fluids; products designed and labeled exclusively to release manufactured products from molds; products for use inside power generating motors, engines, and turbines, and their associated power-transfer gearboxes; two cycle oils or other products designed to be added to fuels; products for use on the human body or animals; or products that are (1) exclusively sold directly or through distributors to establishments which manufacture or construct goods or commodities, and (2) labeled exclusively for "use in the manufacturing process only." "Lubricant" includes products labeled for use in food-servicing environments that include, but are not limited to, restaurants and food stores.

(C) "Lubricant" includes the following subcategories (1.-9.):

1. "Anti-seize Lubricant" means any "Lubricant" designed or labeled exclusively for use in high temperature or high pressure conditions to prevent moving metal parts from seizing or galling, and/or to facilitate disassembly of metal parts. A lubricant that meets the definition for "Firearm Lubricant" is not an "Anti-seize Lubricant."

2. "Cutting or Tapping Oil" means any "Lubricant" designed or labeled exclusively for drilling, cutting, or tapping metals.

3. "Dry Lubricant" means any "Lubricant" which provides lubricity solely by depositing a thin film of solid material including, but not limited to, graphite, molybdenum disulfide ("moly"), polytetrafluoroethylene or closely related fluoropolymer ("teflon"), or boron nitride on surfaces. Products that meet the definition for "Dry Lubricant" are not subject to the requirements for "Anti-seize Lubricant," "Cutting or Tapping Oil," "Gear, Chain, or Wire Lubricant," "Multi-purpose Lubricant,"

"Penetrant," "Rust Preventative or Rust Control Lubricant," or "Silicone-based Multi-purpose Lubricant."

4. "Firearm Lubricant" means any "Lubricant" designed or labeled exclusively for use on firearms or their parts to lubricate or to provide corrosion or rust prevention.

5. "Gear, Chain, or Wire Lubricant" means any "Lubricant" designed or labeled exclusively for use on gears, chains, or wire ropes. "Gear, Chain or Wire Lubricant" does not include lubricant products labeled solely for use on chains of chain-driven vehicles.

6. "Multi-purpose Lubricant" means any "Lubricant" designed or labeled for general purpose lubrication, or a lubricant labeled for use in a wide variety of applications. Products that meet the definition for "Anti-seize Lubricant," "Cutting or Tapping Oil," "Dry Lubricant," "Firearm Lubricant," "Gear, Chain, or Wire Lubricant," "Penetrant," "Rust Preventative or Rust Control Lubricant," "Silicone-based Multi-purpose Lubricant," or other lubricant products labeled solely for a single purpose are not "Multi-purpose Lubricants."

7. "Penetrant" means a "Lubricant" designed or labeled primarily to loosen metal parts that have bonded together due to rusting, oxidation, or other causes. Lubricants that claim to have penetrating qualities, but are not labeled primarily to loosen bonded parts are not "Penetrant" products.

8. "Rust Preventative or Rust Control Lubricant" means any "Lubricant" designed or labeled primarily for the prevention or control of rust. A Lubricant that meets the definition for "Firearm Lubricant" is not a "Rust Preventative or Rust Control Lubricant."

9. "Silicone-based Multi-purpose Lubricant" means any "Lubricant" which is designed or labeled for general lubrication or for use in a wide variety of applications, in which lubricity is primarily provided through the use of silicone compounds including, but not limited to, polydimethylsiloxane. "Silicone-based Multi-purpose Lubricant" does not include silicone-based lubricant products labeled solely for a single purpose.

(~~83~~84) "LVP-VOC" means a chemical "compound" or "mixture" that contains at least one carbon atom and meets one of the following:

(A) has a vapor pressure less than 0.1 mm Hg at 20°C, as determined by CARB Method 310; or

(B) is a chemical "compound" with more than 12 carbon atoms, or a chemical "mixture" comprised solely of "compounds" with more than 12 carbon atoms, as verified by formulation data, and the vapor pressure and boiling point are unknown; or

(C) is a chemical "compound" with a boiling point greater than 216°C, as determined by CARB Method 310; or

(D) is the weight percent of a chemical "mixture" that boils above 216°C, as determined by CARB Method 310.

For the purposes of the definition of LVP-VOC, chemical "compound" means a molecule of definite chemical formula and isomeric structure, and chemical "mixture" means a substance comprised of two or more chemical "compounds."

(~~84~~85) "Manufacturer" means any person who imports, manufactures, assembles, produces, packages, repackages, or relabels a consumer product.

(~~85~~86) "Medicated Astringent/Medicated Toner" means any product regulated as a drug by the Food and Drug Administration (FDA) which is applied to the skin for the purpose of cleaning or tightening pores. "Medicated Astringent/Medicated Toner" includes, but is not limited to, clarifiers and substrate-impregnated products. "Medicated Astringent/Medicated Toner" does not include hand, face, or body cleaner or soap products, "Personal Fragrance Product," "Astringent/Toner," cold cream, lotion, antiperspirants, or products that must be purchased with a doctor's prescription.

(~~86~~87) "Metal Polish or Cleanser" means any product designed or labeled to improve the appearance and/or protect finished metal, metallic, or metallized surfaces by physical or chemical action. To "improve the appearance" means to remove, or reduce stains, impurities, or oxidation from surfaces or to make surfaces smooth and shiny. "Metal Polish or Cleanser" includes, but is not limited to metal polishes used on brass, silver, chrome, copper, stainless steel and other ornamental metals. "Metal Polish or Cleanser" does not include "Automotive Wax, Polish, Sealant or Glaze," "General Purpose Cleaner," "Tire or Wheel Cleaner," "Paint Remover or Stripper," products designed and labeled exclusively for automotive and marine detailing, or products designed for use in degreasing tanks.

(~~87~~88) "Motor Vehicle Wash" means a product designed or labeled to wash, wash and wax, wash and shine, or wash and/or clean the exterior surface of motor vehicles. "Motor Vehicle Wash" includes, but is not limited to, products for use in commercial, fleet, hand, and "drive through" car washes; commercial truck washing or large vehicle washing stations; vehicle dealers and repair shops as well as products intended for household consumer use. "Motor Vehicle Wash" does not include "Bug and Tar Remover," "Glass Cleaner," "Tire or Wheel Cleaner," and products labeled for use exclusively on locomotives or aircraft.

~~(~~(~~88~~89) "Multi-purpose Solvent" means:

(A) for products manufactured before January 1, 2015: any liquid product designed or labeled to be used for dispersing, dissolving, or removing contaminants or other organic materials. "Multi-purpose Solvent" includes: 1. products that do not display specific use instructions on the product container or packaging; 2. products that do not specify an end-use function or application on the product container or packaging; 3. solvents used in institutional facilities, except for laboratory reagents used in analytical, educational, research, scientific or other laboratories; 4. "Paint clean-up" products; and 5. products labeled to prepare surfaces for painting. For the purposes of this definition only, "Paint clean-up" means any liquid product labeled for cleaning oil-based or water-based paint, lacquer, varnish, or related coatings from, but not limited to, painting equipment or tools, plastics, or metals. "Multi-purpose Solvent" does not include 1. solvents used in cold cleaners, vapor degreasers, conveyorized degreasers or film cleaning machines; 2. solvents labeled exclusively for the clean-up of application equipment used for polyaspartic and polyurea coatings; 3. products that are labeled exclusively to clean a specific contaminant, on a single substrate, in specific situations; or 4. except as provided in section 94509(p)(4)(A), any product making any representation that the product may be used as, or is suitable for use as a consumer product which meets another definition in section 94508(a); such products are not "Multi-purpose Solvents" and are subject to the "Most Restrictive Limit" provisions of section 94512(a).

(B) for products manufactured on or after January 1, 2015: any product designed or labeled to be used for dispersing, dissolving, or removing contaminants or other organic materials.

"Multi-purpose Solvent" includes:

1. products that do not display specific use instructions on the product container or packaging;

2. products that do not display an end-use function or application on the product container or packaging;

3. solvents used in institutional facilities;

4. products labeled as "Paint Clean-Up," or products designed or labeled for cleaning oil-based or water-based paint, lacquer, varnish, or related coatings from painting equipment or tools, plastics, or metals;

5. products labeled to prepare surfaces for painting; and

6. products that display on the Principal Display Panel a specific chemical name. Examples of specific chemical names include mineral spirits, ketone, turpentine, toluene, xylene(s), acetone, naphtha, or alcohol.

"Multi-purpose Solvent" does not include:

1. solvents used in cold cleaners, vapor degreasers, conveyorized degreasers or film cleaning machines;

2. solvents labeled exclusively for the clean-up of application equipment used for polyaspartic and polyurea coatings;

3. products that are labeled exclusively to clean a specific contaminant, on a single substrate;

4. "Rubbing Alcohol;"

5. laboratory reagents used in analytical, educational, research, scientific or other laboratories; and

6. products that are used exclusively for the thinning of "Industrial Maintenance Coatings," "Zinc –Rich Primers," or "High Temperature Coatings" that meet both of the following criteria:

   a. the Responsible Party also manufactures for sale in California "Industrial Maintenance Coatings," "Zinc – Rich Primers," or "High Temperature Coatings;" and

   b. the label states the specific product or brand of the "Industrial Maintenance Coating," Zinc-Rich Primer," or

"High Temperature Coating" for which the product is used.

7. denatured alcohol products that are sold directly or through distributors to a "Public Utility" as defined by §216 of the Public Utilities Code, and is used to maintain electrical equipment that meet both of the following criteria:

a. the equipment is owned by a "Public Utility"; and

b. the equipment manufacturer states that maintenance can only be performed with denatured alcohol.

(~~89~~90) "Nail Polish" means any clear or colored coating designed for application to the fingernails or toenails and including but not limited to, lacquers, enamels, acrylics, base coats and top coats.

(~~90~~91) "Nail Polish Remover" means a product designed to remove nail polish and coatings from fingernails or toenails.

~~(91) "No Rinse Shampoo" means a product designed or labeled solely to be applied to hair that is dry to clean, absorb oil, or eliminate odor, and is subsequently removed from the hair by combing, brushing, or toweling the hair.~~

* * * *

(b) *Severability.*

If any subsection, paragraph, subparagraph, sentence, clause, phrase, or portion of section 94507, 94508, 94509, 94510, 94511, 94512, 94513, 94514, 94515, 94516, or 94517 of this regulation is, for any reason, held invalid, unconstitutional, or unenforceable by any court of competent jurisdiction, such portion shall be deemed as a separate, distinct, and independent provision, and such holding shall not affect the validity of the remaining portions of the regulation.

NOTE: Authority cited: sections 38501, 38510, 38560, 38560.5, 38562, 38580, 39515, 39516, 39600, 39601, 39659, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 38501, 38510, 38560, 38560.5, 38562, 38580, 39000, 39002, 39003, 39600, 40000, 41511, 41700, and 41712, Health and Safety Code.

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§ 94509. Standards for Consumer Products.

(a) Except as provided in sections 94510 (Exemptions), 94511 (Innovative Products), 94514 (Variances), and 94540 through 94555 (Alternative Control Plan), title 17, California Code of Regulations, no person shall sell, supply, offer for sale, or manufacture for sale in California any consumer product which, at the time of sale or manufacture, contains volatile organic compounds in excess of the limits specified in the following Table of Standards after the specified effective dates.

Table of Standards
Percent Volatile Organic Compound by Weight

Product Category	***Effective Date*** [1]	***VOC Standard*** [2]
Adhesive*:		
[*See section 94510(i) for an exemption that applies to adhesives.]		
Aerosol**	1/1/95	75
Mist Spray Adhesive**	1/1/2002 1/1/2017	65 30
Web Spray Adhesive**	1/1/2002 1/1/2017	55 40
Special Purpose Spray Adhesive**		
Automobile Headliner Adhesive	1/1/2002	65
Automotive Engine Compartment Adhesive	1/1/2002	70
Flexible Vinyl Adhesive	1/1/2002	70
Laminate Repair/Edgebanding Adhesive	1/1/2002	60
Mounting Adhesive	1/1/2002	70
Plastic Pipe Adhesive	8/1/2022	60
Polystyrene Foam Adhesive	1/1/2002	65
Polyolefin Adhesive	1/1/2002	60
Screen Printing Adhesive	1/1/2017	55

Product Category	*Effective Date* [1]	*VOC Standard* [2]
[**See sections 94509(i), 94509(m)(1)(A), 94509(n), 94512(d), and 94513(d) for additional requirements that apply to aerosol adhesive.]		
Construction, Panel, or Floor Covering Adhesive[#]	1/1/95 12/31/2002 12/31/2008	40 15 7
[#See section 94509(k) for the effective date of the VOC limit for certain types of Construction, Panel, or Floor Covering Adhesive, and subsection 94509(m)(1)(A) for additional requirements that apply to Construction, Panel, or Floor Covering Adhesive.]		
Contact[##] Contact Adhesive – General Purpose Contact Adhesive – Special Purpose	1/1/95 12/31/2006 12/31/2006	80 55 80
[##See subsections 94509(m)(1)(A) and section 94512(d) for additional requirements that apply to Contact Adhesive.]		
General Purpose	1/1/95	10
Adhesive Remover*: Floor or Wall Covering Adhesive Remover	12/31/2006	5
Gasket or Thread Locking Adhesive Remover	12/31/2006	50
General Purpose Adhesive Remover	12/31/2006	20
Specialty Adhesive Remover	12/31/2006	70
[*See subsections 94509(m)(1)(A) and section 94512(d) for additional requirements that apply to Adhesive Remover.]		
Aerosol Cooking Spray	1/1/95	18
Air Freshener (manufactured before January 1, 2023)*: Double Phase Aerosol**	1/1/93 12/31/2004 12/31/2012	30 25 20
Single Phase Aerosol	1/1/93 1/1/96	70 30

Product Category	*Effective Date* [1]	*VOC Standard* [2]
Air Freshener (manufactured on or after January 1, 2023)* Automatic Aerosol Air Freshener	1/1/2023	30
Manual Aerosol Air Freshener**	1/1/2023 1/1/2027	10 5
Concentrated Aerosol Air Freshener**	1/1/2023 1/1/2027	15 10
Total Release Aerosol Air Freshener**	1/1/2023	25
Air Freshener* Dual Purpose Air Freshener/Disinfectant aerosol	1/1/94	60
Liquid/pump spray	1/1/93	18
Solid/semisolid#	1/1/93	3
[*See sections 94510(f) for an exemption that applies to Air Freshener.] [**See section 94509(n) for additional requirements that apply to Double Phase Aerosol Air Freshener, and sections 94509 (m)(1)(B) and 94509(n) for additional requirements that apply to Manual Aerosol Air Freshener, Concentrated Aerosol Air Freshener, and Total Release Aerosol Air Freshener.] [#See subsections 94509(m)(2) and 94510(g)(2) for additional provisions that apply to Air Freshener (solid).]		
Anti-static Product: aerosol	12/31/2008	80
nonaerosol	12/31/2006	11
Astringent/Toner	12/31/2010	35
Automotive Rubbing or Polishing Compound all forms	1/1/2005	17
Automotive Wax/Polish/Sealant/Glaze: all other forms	1/1/2005	15
hard paste wax	1/1/2005	45
instant detailer	1/1/2001	3
Automotive Windshield Washer Fluid*:		

Product Category	*Effective Date* [1]	*VOC Standard* [2]
Type "A" areas	1/1/93 12/31/2008	35 25
Nontype "A" areas	1/1/93 12/31/2002	10 1
*See section 94508(a)(~~20~~19), section 94509(b)(3), and section 94509(l) for provisions that apply to Automotive Windshield Washer Fluid.		
Bathroom and Tile Cleaner*:		
aerosol	1/1/94	7
all other forms	1/1/94	5
nonaerosol	12/31/2008	1
[*See subsection 94509(m)(1)(A) for additional requirements that apply to Bathroom and Tile Cleaner.]		
Brake Cleaner*	1/1/97 12/31/2002 12/31/2008 12/31/2010	50 45 20 10
[*See subsection 94509(m)(1)(A) for additional requirements that apply to Brake Cleaner]		
Bug and Tar Remover	1/1/2002	40
Carburetor or Fuel-injection Air Intake Cleaner *	1/1/95 12/31/2002 12/31/2008 12/31/2010	75 45 20 10
[*See section 94509(k) for the effective date of the VOC limit and see subsection 94509(m)(1)(A) for additional requirements that apply to Carburetor or Fuel-injection Air Intake Cleaner.]		
Carpet/Upholstery Cleaner*:		
aerosol	1/1/2001 12/31/2010	7 5
nonaerosol (dilutable)	1/1/2001	0.1
nonaerosol (ready-to-use)	1/1/2001 12/31/2010	3 1
[*See subsection 94509(m)(1)(A) for additional requirements that apply to Carpet/Upholstery Cleaner]		

Product Category	*Effective Date* [1]	*VOC Standard* [2]
Charcoal Lighter Material	See Section 94509(h)	
Disinfectant: aerosol	12/31/2008	70
nonaerosol	12/31/2008	1
Dry Shampoo*	1/1/2023 1/1/2029	55 50
[*See subsections 94509(m)(1)(B), and 94509(n) for additional requirements that apply to Dry Shampoo]		
Dusting Aid: aerosol	1/1/95 1/1/97 12/31/2010	35 25 17
nonaerosol	1/1/95 12/31/2010	7 3
Electrical Cleaner*	12/31/2006	45
[*See subsections 94509(m)(1)(A) and section 94512(d) for additional requirements that apply to Electrical Cleaner.]		
Electronic Cleaner*	12/31/2007	75
[*See subsection 94509(m)(1)(A) and section 94512(d) for additional requirements that apply to Electronic Cleaner.]		
Engine Degreaser*:	1/1/93 1/1/96	75 50
aerosol	12/31/2004 12/31/2010	35 10
nonaerosol	12/31/2004	5
[*See subsection 94509(m)(1)(A) for additional requirements that apply to Engine Degreaser]		
Fabric Protectant* aerosol	1/1/95 1/1/97	75 60

Product Category	*Effective Date* [1]	*VOC Standard* [2]
nonaerosol	1/1/95 1/1/97 12/31/2010	75 60 1
[*See subsection 94509(m)(1)(A) for additional requirements that apply to Fabric Protectant]		
Fabric Refresher: aerosol	12/31/2006	15
nonaerosol	12/31/2006	6
Fabric Softener – Single Use Dryer Product	See Section 94509(o)	
Floor Maintenance Product	12/31/2010	1
Floor Polish or Wax: Resilient Flooring Material	1/1/94 12/31/2010	7 1
Nonresilient Flooring Material	1/1/94 12/31/2010	10 1
Wood Floor Wax	1/1/94 12/31/2010	90 70
Floor Wax Stripper: nonaerosol	See Section 94509(j)	
Footwear or Leather Care Product*: aerosol	12/31/2006	75
solid	12/31/2006	55
all other forms	12/31/2006	15
[*See subsection 94509(m)(1)(A) for additional requirements that apply to Footwear or Leather Care Product.]		
Furniture Maintenance Product*: aerosol	1/1/94 12/31/2004 12/31/2013	25 17 12
all other forms (except solid/paste forms)	1/1/94	7
nonaerosol (except solid/paste forms)	12/31/2008	3

Product Category	*Effective Date* [1]	*VOC Standard* [2]
[*See section 94509(n) for additional requirements that apply to Furniture Maintenance Product.]		
General Purpose Cleaner*: aerosol and nonaerosol	1/1/94	10
aerosol	12/31/2008	8
nonaerosol+	12/31/2004 12/31/2012	4 0.5
[*See subsections 94509(m)(1)(A) and (m)(3) for additional requirements that apply to General Purpose Cleaner.] [+See subsections 94510(c)(1) and (c)(3) for exemptions that apply to fragrance and monoterpene]		
General Purpose Degreaser*: aerosol	1/1/2002 12/31/2008 12/31/2010	50 20 10
nonaerosol+	12/31/2004 12/31/2012	4 0.5
[*See subsections 94509(m)(1)(A) and (m)(3) for additional requirements that apply to General Purpose Degreaser.] [+See subsections 94510(c)(1) and (c)(3) for exemptions that apply to fragrance and monoterpene]		
Glass Cleaner*: aerosol	1/1/93 12/31/2012	12 10
nonaerosol	1/1/93 1/1/96 12/31/2004 12/31/2012	8 6 4 3
[*See subsection 94509(m)(3) for additional requirements that apply to nonaerosol Glass Cleaner]		
Graffiti Remover*: aerosol	12/31/2006	50
nonaerosol	12/31/2006	30

Product Category	*Effective Date* [1]	*VOC Standard* [2]
[*See subsection 94509(m)(1)(A) for additional requirements that apply to Graffiti Remover.]		
Hair Mousse	1/1/94 12/31/2002	16 6
Hair Shine*	1/1/2005 1/1/2029	55 50
[*See subsections 94509(m)(1)(B) and 94509(n) for additional requirements that apply to Hair Shine.]		
Hair Finishing Spray*	1/1/93 6/1/99 1/1/2023	80 55 50
[*See subsections 94509(m)(1)(B) and 94509(n) for additional requirements that apply to Hair Finishing Spray.]		
Hair Styling Product: aerosol and pump spray	12/31/2006	6
all other forms	12/31/2006	2
Heavy-duty Hand Cleaner or Soap* all forms	1/1/2005	8
nonaerosol	12/31/2013	1
[*See subsection 94509(m)(3) for additional requirements that apply to nonaerosol Heavy-duty Hand Cleaner or Soap]		
Insect Repellent: aerosol	1/1/94	65
Insecticide*: Crawling Bug Insecticide (all forms):	1/1/95 1/1/98	40 20
aerosol #	12/31/2004 1/1/2030	15 8
Bed Bug Insecticide (all forms) Bed Bug Insecticide (aerosol)	1/1/2030 1/1/2030	20 15
Flea or Tick Insecticide	1/1/95	25
Flying Bug Insecticide (all forms) **:	1/1/95	35

Product Category	*Effective Date* [1]	*VOC Standard* [2]
aerosol	12/31/2003 12/31/2013	25 20
Fogger	1/1/95	45
Lawn or Garden Insecticide (all forms)	1/1/95	20
nonaerosol	12/31/2003	3
Wasp or Hornet Insecticide**	1/1/2005 12/31/2013	40 10
[*See sections 94510(g)(1) and 94510(k) for exemptions that apply to certain insecticides.] [#See subsections 94509(m)(1)(B) and 94509(n) for additional requirements that apply to Crawling Bug Insecticide (aerosol)]. [**See subsection 94509(n) for additional requirements that apply to Flying Bug and Wasp or Hornet Insecticide]		
Laundry Prewash: aerosol/solid	1/1/94	22
all other forms	1/1/94	5
Laundry Starch/Sizing/Fabric Finish Product:	1/1/95 1/31/2008	5 4.5
Lubricant*		
[*See subsection 94509(m)(1)(A), for additional requirements that apply to Lubricant products.]		
Anti-Seize Lubricant** aerosol	12/31/2013	40
nonaerosol	12/31/2013	3
Cutting or Tapping Oil** aerosol	12/31/2013	25
nonaerosol	12/31/2013	3
Gear, Chain, or Wire Lubricant** aerosol	12/31/2013	25
nonaerosol	12/31/2013	3
Multi-purpose Lubricant (excluding solid or semisolid products)#**	1/1/2003 12/31/2013 7/1/2019	50 25 10 ##

Product Category	*Effective Date* [1]	*VOC Standard* [2]
Penetrant[#+]	1/1/2003 12/31/2013	50 25
Rust Preventative or Rust Control Lubricant** aerosol	12/31/2013	25
nonaerosol	12/31/2013	3
Silicone-based Multi-purpose Lubricant (excluding solid or semisolid products)	1/1/2005	60
[**See subsection 94509(n) for additional requirements that apply to Anti-Seize Lubricant; Cutting or Tapping Oil; Gear, Chain, or Wire Lubricant; Multi-purpose Lubricant; and Rust Preventative or Rust Control Lubricant products.] [#See subsection 94513(f) for additional requirements that apply to Multi-purpose Lubricant and Penetrant.] [##See subsections 94509(r)(1) through 94509(r)(5) for an alternate compliance option that applies to Multi-purpose Lubricant.] [+See subsection 94509(m)(7) for an exclusion that applies to certain Penetrant products.]		
Metal Polish or Cleanser*:	1/1/2005	30
aerosol	12/31/2012	15
nonaerosol	12/31/2012	3
[*See subsection 94509(m)(1)(A) and subsection 94509(n) for additional requirements that apply to Metal Polish or Cleanser.]		
Motor Vehicle Wash nonaerosol	12/31/2010	0.2
Multi-purpose Solvent* aerosol standard for all areas of the State	1/1/2016	10

Product Category	*Effective Date* [1]	*VOC Standard* [2]
nonaerosol		30
standards for the South Coast Air Quality Management District	See section 94509(p)(4)	3
standards for all other areas of the State	12/31/2010 12/31/2013	
[*See sections 94509(b)(1), (m)(1)(A), (n), and (p); 94512(a)(1), (a)(4) and (e); 94513(g); and 94515(j) for additional requirements that apply to Multi-purpose Solvent.]		
Nail Polish Remover	1/1/94 1/1/96 12/31/2004 12/31/2007	85 75 0 1
Nonselective Terrestrial Herbicide: nonaerosol	1/1/2002	3
Odor Remover/Eliminator aerosol	12/31/2010	25
nonaerosol	12/31/2010	6
Oven or Grill Cleaner*: aerosol/pump spray aerosol	 1/1/93 1/1/93	 8 8
liquid	1/1/93	5
nonaerosol	12/31/2008 12/10/2011	1 4
[*See subsection 94509(q) for the effective date of the VOC limit and subsections 94509(m)(1)(A) and (m)(3) for additional requirements that apply to Oven or Grill Cleaner.]		
Paint Remover or Stripper	1/1/2005	50
Paint Thinner* aerosol		
standard for all areas of the State	1/1/2016	10

Product Category	*Effective Date* [1]	*VOC Standard* [2]
nonaerosol		
standards for the South Coast Air Quality Management District	See section 94509(p)(4)	
standards for all other areas of the State	12/31/2010 12/31/2013	30 3
[*See sections 94509(b)(1), (m)(1)(A), (n), and (p); 94512(a)(1), (a)(4) and (e); 94513(g); and 94515(j) for additional requirements that apply to Paint Thinner. See section 94510(m) for an exemption that applies to Paint Thinner.]		
Personal Fragrance Product (manufactured before January 1, 2023)*:		
products with 20% or less fragrance	1/1/95 1/1/99	80 75
products with more than 20% fragrance	1/1/95 1/1/99	70 65
Personal Fragrance Product (manufactured between January 1, 2023, and December 31, 2030)*	1/1/2023	70
aerosol[#]		
nonaerosol		
products with 7% or less fragrance[#]	1/1/2023	70
products with more than 7% fragrance	1/1/2023	75
Personal Fragrance Product (manufactured on or after January 1, 2031)*		
aerosol[#]	1/1/2031	50
nonaerosol		
products with 10% or less fragrance[#]	1/1/2031	50
products with more than 10% fragrance	1/1/2031	75
[*See sections 94510(h), 94510(j), and 94510(l) for exemptions and requirements that apply to Personal Fragrance Product.]		
[[#]See subsection 94509(m)(1)(B), 94509(n) and 94513(i) for additional requirements that apply to Personal Fragrance Product.]		

Product Category	*Effective Date* [1]	*VOC Standard* [2]
Pressurized Gas Duster*	12/31/2010	1
[*See subsections 94509(m)(1)(A), 94509(n) and 94510(c) for additional provisions that apply to Pressurized Gas Duster]		
Rubber /Vinyl Protectant: aerosol	1/1/2005	10
nonaerosol	1/1/2003	3
Sanitizer: aerosol	12/31/2008	70
nonaerosol	12/31/2008	1
Sealant or Caulking Compound* all forms	12/31/2002	4
Chemically Curing nonaerosol	12/31/2012	3
Nonchemically Curing nonaerosol	12/31/2010	1.5
[*See subsections 94509(m)(1)(A) and section 94512(d) for additional requirements that apply to Sealant or Caulking Compound.]		
Shaving Cream	1/1/94	5
Shaving Gel	12/31/2006 12/31/2009	7 4
Spot Remover*: aerosol	1/1/2001 12/31/2012	25 15
nonaerosol	1/1/2001 12/31/2012	8 3
[*See subsections 94509(m)(1)(A) and 94509(n) for additional requirements that apply to Spot Remover.]		
Temporary Hair Color: aerosol*	12/31/2010 1/1/2029	55 50

Product Category	*Effective Date* [1]	*VOC Standard* [2]
[*See subsections 94509(m)(1)(B), and 94509(n) for additional requirements that apply to Temporary Hair Color.]		
Tire or Wheel Cleaner		
aerosol	12/31/2010	8
nonaerosol	12/31/2010	2
Tire Sealant and Inflator	12/31/2002	20
Toilet/Urinal Care Product*:		
aerosol	12/31/2006	10
nonaerosol	12/31/2006	3
[*See subsection 94509(m)(2) for additional requirements that apply to Toilet/Urinal Care Product.]		
Undercoating:		
aerosol	1/1/2002	40
Windshield Water Repellent	12/31/2010	75
Wood Cleaner:		
aerosol	12/31/2006	17
nonaerosol	12/31/2006	4

1 See section 94509(d) for the effective date of the VOC standards for products registered under FIFRA, and section 94509(c) and (d) for the "sell-through" allowed for products manufactured prior to the effective date of standards.

2 See section 94510(c) for an exemption that applies to fragrances in consumer product, and section 94510(d) for an exemption that applies to LVP-VOCs.

* * * *

(m) *Requirements limiting the use of specific toxic compounds in specific consumer products categories.*

(1) Requirements for products listed in Table 94509(m)(1)(A) and Table 94509(m)(1)(B).

Except as provided below in sections 94509(m)(4), (m)(6), and (m)(7), after the applicable effective date specified in Tables 94509(m)(1)(A) and 94509(m)(1)(B) for each product category, no person shall sell, supply, offer for sale, or manufacture for use in California any consumer product:

~~listed in Table 94509(m)(1) that contains any of the following compounds: methylene chloride, perchloroethylene, or trichloroethylene.~~

(A) listed in Table 94509(m)(1)(A) that contains any of the following compounds: methylene chloride, perchloroethylene, or trichloroethylene; or

(B) listed in Table 94509(m)(1)(B) that contains any of the following compounds: parachlorobenzotrifluoride, methylene chloride, perchloroethylene, or trichloroethylene.

Table 94509(m)(1)(A)
Product Categories in which Use of Methylene Chloride, Perchloroethylene, and Trichloroethylene is Prohibited

Product Category	Effective Date	Sell-through Date
Adhesive:		
Aerosol		
• Mist Spray Adhesive	1/1/2002	1/1/2005
• Web Spray Adhesive	1/1/2002	1/1/2005
• Special Purpose Spray Adhesive		
• Automobile Headliner Adhesive	1/1/2002	1/1/2005
• Automotive Engine Compartment Adhesive	1/1/2002	1/1/2005
• Flexible Vinyl Adhesive	1/1/2002	1/1/2005
• Laminate Repair/Edgebanding Adhesive	1/1/2002	1/1/2005
• Mounting Adhesive	1/1/2002	1/1/2005
• Plastic Pipe Adhesive	8/1/2022	8/1/2025
• Polyolefin Adhesive	1/1/2002	1/1/2005
• Polystyrene Foam Adhesive	1/1/2002	1/1/2005
• Screen Printing Adhesive	1/1/2017	1/1/2020
• Construction, Panel or Floor Covering Adhesive	12/31/2008	12/31/2011
Contact Adhesive		
• Contact Adhesive – General Purpose	12/31/2005	12/31/2008
• Contact Adhesive – Special Purpose	12/31/2005	12/31/2008
Adhesive Remover • Floor or Wall Covering Adhesive Remover • Gasket or Thread Locking Adhesive Remover • General Purpose Adhesive Remover • Specialty Adhesive Remover	12/31/2006	12/31/2009

Product Category	Effective Date	Sell-through Date
Automotive Consumer Products: See the Airborne Toxic Control Measure For Emissions Of Chlorinated Toxic Air Contaminants From Automotive Maintenance And Repair Activities, section 93111, title 17, California Code of Regulations for additional requirements that apply to the Automotive Consumer Products: Brake Cleaner, Carburetor or Fuel Injection Air Intake Cleaner, Engine Degreaser, and General Purpose Degreaser - intended for use in automotive maintenance or repair activities.		
Bathroom and Tile Cleaner	12/31/2008	12/31/2011
Carpet/Upholstery Cleaner	12/31/2010	12/31/2013
Electrical Cleaner	12/31/2006	12/31/2009
Electronic Cleaner	12/31/2005	12/31/2008
Electronic Cleaner labeled as energized electronic equipment use only	12/31/2008	12/31/2011
Fabric Protectant	12/31/2010	12/31/2013
Footwear or Leather Care Product	12/31/2005	12/31/2008
General Purpose Cleaner	12/31/2008	12/31/2011
General Purpose Degreaser	12/31/2005	12/31/2008
Graffiti Remover	12/31/2006	12/31/2009
Lubricant:		
• Anti-Seize Lubricant	12/31/2013	12/31/2016
• Cutting or Tapping Oil	12/31/2013	12/31/2016
• Gear, Chain, or Wire Lubricant	12/31/2013	12/31/2016
• Multi-purpose Lubricant (excluding solid or semisolid products)	12/31/2010	12/31/2013
• Penetrant [See subsection 94509(m)(7) for an exclusion that applies to certain Penetrant products.]	12/31/2010	12/31/2013
• Rust Preventative or Rust Control Lubricant	12/31/2013	12/31/2016

Product Category	Effective Date	Sell-through Date
• Silicone-based Multi-purpose Lubricant (excluding solid or semisolid products)	12/31/2012	12/31/2015
Metal Polish or Cleanser	12/31/2012	12/31/2015
Multi-purpose Solvent • aerosol • nonaerosol	1/1/2016 12/31/2010	1/1/2019 12/31/2013
Oven or Grill Cleaner	12/31/2008	12/31/2011
Paint Thinner • aerosol • nonaerosol	1/1/2016 12/31/2010	1/1/2019 12/31/2013
Pressurized Gas Duster (Trichloroethylene is not prohibited)	12/31/2010	12/31/2011
Sealant or Caulking Compound	12/31/2010	12/31/2013
Single Purpose Cleaner	1/1/2017	1/1/2020
Single Purpose Degreaser	1/1/2017	1/1/2020
Spot Remover	12/31/2012	12/31/2015
~~Wasp or Hornet Insecticide~~	~~12/31/2013~~	~~12/31/2016~~

Table 94509(m)(1)(B)
Product Categories in which Use of Parachlorobenzotrifluoride, Methylene Chloride, Perchloroethylene, and Trichloroethylene is Prohibited

Product Category	Effective Date	Sell-through Date
Air Fresheners		
• Manual Aerosol Air Freshener	1/1/2023	1/1/2026
• Concentrated Aerosol Air Freshener	1/1/2023	1/1/2026
• Total Release Aerosol Air Freshener	1/1/2023	1/1/2026
Crawling Bug Insecticide (aerosol)	1/1/2030	1/1/2033
Hair Care Products		
• Dry Shampoo	1/1/2023	1/1/2026
• Hair Finishing Spray	1/1/2023	1/1/2026
• Hair Shine	1/1/2029	1/1/2032
• Temporary Hair Color	1/1/2029	1/1/2032
Personal Fragrance Products		
• comprised of less than or equal to 7 percent fragrance	1/1/2023	1/1/2026
• comprised of between 7 and less than or equal to 10 percent fragrance	1/1/2031	1/1/2034

(2) *Requirements for products listed in Table (m)(2).*

Except as provided below in sections 94509(m)(4) after the applicable effective date specified in Table 94509(m)(2) for each product category, no person shall sell, supply, offer for sale, or manufacture for use in California any consumer product listed in Table 94509(m)(2) that contains para- dichlorobenzene.

Table 94509(m)(2)
Product Categories in which Use of Para-dichlorobenzene is Prohibited

Product Category	Effective Date	Sell-through Date
Air Freshener (solid)	12/31/2005	12/31/2006
Toilet/Urinal Care Products	12/31/2005	12/31/2006

(3) *Requirements for products listed in Table (m)(3).*

Except as provided below in sections 94509(m)(4) and (m)(6), after the applicable effective date specified in Table 94509(m)(3) for each product category, no person shall sell, supply, offer for sale, or manufacture for use in California any consumer product listed in Table 94509(m)(3) that contains an alkylphenol ethoxylate surfactant compound.

Table 94509(m)(3)
Product Categories in which Use of Alkylphenol Ethoxylate Surfactants is Prohibited

Product Category	Effective Date	Sell-through Date
General Purpose Cleaner (nonaerosol)	12/31/2012	12/31/2015
General Purpose Degreaser (nonaerosol)	12/31/2012	12/31/2015
Glass Cleaner (nonaerosol)	12/31/2012	12/31/2015
Heavy-duty Hand Cleaner or Soap (nonaerosol)	12/31/2013	12/31/2016
Oven or Grill Cleaner	12/31/2012	12/31/2015

(4) *Sell-through of Products*. Consumer products listed in Tables 94509(m)(1)(A), (m)(1)(B), (m)(2), or (m)(3) that were manufactured before the specified effective date listed in Table 94509(m)(1)(A), (m)(1)(B), (m)(2), or (m)(3), may be sold, supplied, or offered for sale until the corresponding "sell-through" date listed in Table 94509(m)(1)(A), (m)(1)(B), (m)(2), or (m)(3), so long as the product complies with the product dating requirements in section 94512(b).

(5) *Notification for products sold during the sell-through period.* Any person who sells or supplies a consumer product identified listed in section 94509(m)(1)(A), (m)(1)(B), (m)(2), or (m)(3) must notify the purchaser of the product of the sell-through period dates, provided, however, that this notification must be given only if both of the following conditions are met:

(A) the product is sold or supplied to a distributor or retailer; and

(B) the product is sold or supplied within 6 months of the specified effective date.

(6) *Impurities*. The requirements of section 94509(m)(1)(A), (m)(1)(B), and (m)(5) shall not apply to any consumer product listed in Tables 94509(m)(1)(A) or (m)(1)(B), containing parachlorobenzotrifluoride, methylene chloride, perchloroethylene, or trichloroethylene that is present as an impurity in a combined amount equal to or less than 0.01% by

weight.

(7) The requirements of section 94509(m)(1)(A), shall not apply to "Penetrant" products used on equipment when electrical current exists; residual electrical potential from a component exists; or an open flame exists, as long as the "Principal Display Panel" clearly displays the statement: "Nonflammable: For use on energized equipment only."

(n) *Requirements limiting the use of any chemical compound that has a Global Warming Potential (GWP) Value of 150 or greater.*

(1) *Requirements for products listed in Table (n)(1)*

Except as provided below in sections 94509(n)(2) and (n)(3), after the applicable effective date specified in Table 94509(n)(1), no person shall sell, supply, offer for sale, or manufacture for use in California any consumer product listed in Table 94509(n)(1) that contains any chemical compound that has a GWP Value of 150 or greater.

Table 94509(n)(1)
Product Categories in which Use of Any Chemical Compound that has a Global Warming Potential (GWP) Value of 150 or Greater is Prohibited[1]

Product Category	Effective Date	Sell-through Date
~~Aerosol~~ Adhesive:		
Aerosol		
• Mist Spray Adhesive	1/1/2017	1/1/2020
• Web Spray Adhesive	1/1/2017	1/1/2020
• Special Purpose Adhesive		
• Plastic Pipe Adhesive	8/1/2022	8/1/2025
• Screen Printing Adhesive	1/1/2017	1/1/2020
Double Phase Aerosol Air Freshener (manufactured before January 1, 2023)	12/31/2012	12/31/2015
Aerosol Air Freshener (manufactured on or after January 1, 2023)		
• Manual Aerosol Air Freshener	1/1/2023	1/1/2026
• Concentrated Aerosol Air Freshener	1/1/2023	1/1/2026
• Total Release Aerosol Air Freshener	1/1/2023	1/1/2026
Crawling Bug Insecticide (aerosol)	1/1/2030	1/1/2033

Product Category	Effective Date	Sell-through Date
Flying Bug Insecticide	12/31/2013	12/31/2016
Furniture Maintenance Product	12/31/2013	12/31/2016
Hair Care Products		
• Dry Shampoo	1/1/2023	1/1/2026
• Hair Finishing Spray	1/1/2023	1/1/2026
• Hair Shine	1/1/2029	1/1/2032
• Temporary Hair Color	1/1/2029	1/1/2032
Lubricant:		
• Anti-Seize Lubricant	12/31/2013	12/31/2016
• Cutting or Tapping Oil	12/31/2013	12/31/2016
• Gear, Chain, or Wire Lubricant	12/31/2013	12/31/2016
• Multi-purpose Lubricant (excluding solid or semisolid products)	7/1/2019	7/1/2022
• Rust Preventative or Rust Control Lubricant	12/31/2013	12/31/2016
Metal Polish or Cleanser	12/31/2012	12/31/2015
Multi-purpose Solvent		
• aerosol	1/1/2016	1/1/2019
• nonaerosol	12/31/2010	12/31/2013
Paint Thinner		
• aerosol	1/1/2016	1/1/2019
• nonaerosol	12/31/2010	12/31/2013
Personal Fragrance Products		
• comprised of less than or equal to 7 percent fragrance	1/1/2023	1/1/2026
• comprised of between 7 and less than or equal to 10 percent fragrance	1/1/2031	1/1/2034
Pressurized Gas Duster	12/31/2010	12/31/2011
Spot Remover	12/31/2012	12/31/2015
Wasp or Hornet Insecticide	12/31/2013	12/31/2016

1 – Consumer products may also be subject to requirements in title 17, CCR, section 95371 et seq.

* * * *

NOTE: Authority cited: sections 38500, 38501, 38510, 38560, 38560.5, 38562, 38562.5, 38566, 38580, 39515, 39516, 39600, 39601, 39650, 39658, 39659, 39666, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 38501, 38505, 38551, 39002, 39003, 39600, 39602, 39650, 39655, 39656, 39658, 39659, 39666, 40000, 41504, 41511, and 41712, Health and Safety Code.

§ 94510. Exemptions

* * * *

(c) Except for Pressurized Gas Duster, the VOC limits specified in Section 94509(a) shall not apply to ~~fragrances up to a combined level of 2 percent by weight contained in any consumer product.~~the following:

(1) For "General Purpose Cleaner" (nonaerosol) and "General Purpose Degreaser" (nonaerosol) products manufactured before January 1, 2031, fragrances up to a combined 2 percent by weight and monoterpenes up to a combined 0.25 percent by weight, not to exceed a combined total of 2 percent fragrances and monoterpenes by weight.

(2) For products, other than "General Purpose Cleaner" (nonaerosol) and "General Purpose Degreaser" (nonaerosol), manufactured before January 1, 2031, fragrances up to a combined level of 2 percent by weight.

(3) For "General Purpose Cleaner" (nonaerosol) and "General Purpose Degreaser" (nonaerosol) products manufactured on or after January 1, 2031, fragrances and/or monoterpenes up to a combined 0.25 percent by weight.

(4) For "Air Freshener," "Disinfectant," and "Sanitizer" products manufactured on or after January 1, 2031, fragrances up to a combined level of 0.25 percent by weight.

For the purposes of subsections (c)(1) and (c)(3), "Monoterpene" means one or more chemical compounds listed by the specific chemical name or associated Chemical Abstracts Service (CAS) number in Table 94510(c).

Table 94510(c)
Specified Monoterpenes

Chemical Name	CAS #
limonene (d isomer)	5989-27-5
limonene (l isomer)	5989-54-8
dipentene (dl-limonene)	138-86-3
α-pinene	80-56-8
α-pinene (d isomer)	7785-70-8
α-pinene (l isomer)	7785-26-4
β-pinene	127-91-3
β-pinene (l isomer)	18172-67-3

(d) The VOC limits specified in Section 94509(a), and the provisions identified in Section 94510(c), shall not apply to any LVP-VOC.

* * * *

NOTE: Authority cited: sections 39600, 39601, 39515, 39516, 41503.5, 41511, 41700, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94511. Innovative Products.

(a) The Executive Officer shall exempt a consumer product from the VOC limits specified in Section 94509(a) if a manufacturer demonstrates by clear and convincing evidence that, due to some characteristic of the product formulation, design, delivery systems or other factors, the use of the product will result in less VOC emissions as compared to:

(1) the VOC emissions from a representative consumer product which complies with the VOC limits specified in Section 94509(a), or

(2) the calculated VOC emissions from a noncomplying representative product, if the product had been reformulated to comply with the VOC limits specified in section 94509(a). VOC emissions shall be calculated using the following equation:

$$E_R = E_{NC} \times VOC_{STD} \div VOC_{NC}$$

where:

E_R = The VOC emissions from the noncomplying representative product, had it been reformulated.

E_{NC} = The VOC emissions from the noncomplying representative product in its current formulation.

VOC_{STD} = the VOC limit specified in 94509(a).

VOC_{NC} = the VOC content of the noncomplying product in its current formulation.

If a manufacturer demonstrates that this equation yields inaccurate results due to some characteristic of the product formulation or other factors, an

alternative method which accurately calculates emissions may be used upon approval of the Executive Officer.

(b) For the purposes of this section, "representative consumer product" means a consumer product which meets all of the following criteria:

(1) the representative product shall be subject to the same VOC limit in Section 94509(a) as the innovative product.

(2) the representative product shall be of the same product form as the innovative product, unless the innovative product uses a new form which does not exist in the product category at the time the application is made.

(3) the representative product shall have at least similar efficacy as other consumer products in the same product category based on tests generally accepted for that product category by the consumer products industry.

(c) The Executive Officer shall exempt an "Innovative Compressed Gas Propellant Product" or "Innovative Liquefied Propellant Product" in the aerosol "Hair Finishing Spray," "Dry Shampoo," or "Personal Fragrance Product" categories from the VOC standards adopted on August 1, 2022 and specified in section 94509(a) if the product manufacturer demonstrates by clear and convincing evidence at the time of the IPE application that an "Innovative Compressed Gas Propellant Product" meets the criteria in sections (c)(1) and (c)(3) through (c)(6) and an "Innovative Liquefied Propellant Product" meets the criteria in sections (c)(2) through (c)(6).

(1) "Innovative Compressed Gas Propellant Product" means a product which meets all of the following criteria:

(A) For a product manufactured before January 1, 2029, the HFC-152a propellant is replaced with a propellant comprised of compressed air, compressed nitrogen, and/or compressed carbon dioxide, and use of the replacement propellant will result in the Innovative Compressed Gas Propellant Product achieving a 50 percent or greater reduction in greenhouse gas (GHG) emissions compared to the Representative HFC-152a Product;

(B) For a product manufactured on or after January 1, 2029, the Innovative Compressed Gas Propellant Product includes only ingredients with a GWP less than 10, or achieves a 90 percent or greater reduction in GHG emissions compared to the Representative HFC-152a Product;

(C) The weight of the Innovative Compressed Gas Propellant Product propellant or propellants does not exceed 50 percent of the weight of the Representative HFC-152a Product propellant or propellants; and

(D) The ozone-forming potential of the Innovative Compressed Gas Propellant Product does not exceed that of the Representative HFC-152a Product.

(2) "Innovative Liquefied Propellant Product" means a product which meets all of the following criteria:

(A) For a product manufactured before January 1, 2029, the Innovative Liquefied Propellant Product achieves a 50 percent or greater reduction in GHG emissions compared to the Representative HFC-152a Product;

(B) For a product manufactured on or after January 1, 2029, the Innovative Liquefied Propellant Product includes only ingredients with a GWP less than 10, or achieves a 90 percent or greater reduction in GHG emissions compared to the Representative HFC-152a Product; and

(C) The ozone-forming potential of the Innovative Liquefied Propellant Product does not exceed that of the Representative HFC-152a Product.

(3) "Representative HFC-152a Product" means a product that meets either (A) or (B) below:

(A) A consumer product that has the product formulation identified in Table 94511(c)(3) for the applicable product category; or

(B) A compliant consumer product that meets (i) through (v) below:

i) is in the same product category as the innovative product,

ii) is available for purchase in California at the time of the IPE application,

iii) has a PWMIR no greater than (5.0) percent above the applicable product formulation in Table 94511(c)(3),

iv) has a GHG composition that is no lower than five (5.0) ingredient weight percent below the applicable product formulation in Table 94511(c)(3), and

v) has a fragrance content that is representative of products on the California market in the applicable category at the time of the IPE application.

Table 94511(c)(3): Representative HFC-152a Product Formulations

Product Category and Applicable VOC Standard	Ingredient Weight Percent				
	Ethanol	HFC-152a	Fragrance	Other VOC or LVP-VOC*	Non-Volatiles and Exempt VOCs**
Hair Finishing Spray: 50% VOC	45	45	0.1	3.9	6
Dry Shampoo: 55% VOC	30	29	0.2	30.8	10
Dry Shampoo: 50% VOC	30	33	0.2	26.8	10
Personal Fragrance Product: 70% VOC	40	15	2	30	13
Personal Fragrance Product: 50% VOC	30	30	2	22	16

* Ingredients in this column are assumed to have an average MIR of 0.9. The Executive Officer may approve an alternate average MIR for "Other VOC or LVP-VOC" ingredients in the "Personal Fragrance Product: 70% VOC" category based upon product category sales and ingredient information submitted by the applicant.

** Ingredients in this column are assumed to have an average MIR of 0.0.

(4) An "Innovative Compressed Gas Propellant Product" or an "Innovative Liquefied Propellant Product" shall have at least similar efficacy as other consumer products in the same category, based upon consumer or scientific testing generally accepted for that product category by the consumer products industry, demonstrated product spray rate, percent or efficacy of active ingredients, or information that the applicant may provide or that CARB may request. Application of a greater quantity of innovative product shall not be needed to achieve the same efficacy as the representative product.

(5) GHG emissions shall be calculated as follows:

(A) The GHG emissions for an "Innovative Compressed Gas Propellant Product," "Innovative Liquefied Propellant Product," or Representative HFC-152a Product shall be calculated using the following equation for the purposes of determining compliance with section 94511(c):

$GHG_{PRODUCT} = (GWP_{INGREDIENT} \times Wt)_1 + (GWP_{INGREDIENT} \times Wt)_2 + \ldots + (GWP_{INGREDIENT} \times Wt)_n$

where:

$GHG_{PRODUCT}$ = the GHG emissions from the Innovative Compressed Gas Propellant Product, Innovative Liquefied Propellant Product, or Representative HFC-152a Product;

$GWP_{INGREDIENT}$ = ingredient GWP, as specified in 94511(c)(5)(B-D);

Wt = ingredient weight;

1,2,3,…,n = each ingredient in the Innovative Compressed Gas Propellant Product, Innovative Liquefied Propellant Product, or Representative HFC-152a Product, up to the total n ingredients in the Innovative Compressed Gas Propellant Product, Innovative Liquefied Propellant Product, or Representative HFC-152a Product.

(B) The global warming potential of the proposed Innovative Compressed Gas Propellant Product, Innovative Liquefied Propellant Product, or Representative HFC-152a Product shall be determined by using the 100-Year GWP values from the Intergovernmental Panel on Climate Change's (IPCC) Fourth Assessment Report (Forster, P., V. Ramaswamy, P. Artaxo, T. Berntsen, R. Betts, D.W. Fahey, J. Haywood, J. Lean, D.C. Lowe, G. Myhre, J. Nganga, R. Prinn, G. Raga, M. Schulz and R. Van Dorland, 2007: Changes in Atmospheric Constituents and in Radiative Forcing. In: Climate Change 2007: The Physical Science Basis. Contribution of Working Group I to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change [Solomon, S., D. Qin, M. Manning, Z. Chen, M. Marquis, K.B. Averyt, M.Tignor and H.L. Miller (eds.)]. Cambridge University Press, Cambridge, United Kingdom and New York, NY, USA.), incorporated by reference herein.

(C) For an ingredient for which no GWP value exists in the IPCC's Fourth Assessment Report, but for which a GWP value does exist in the IPCC's Fifth Assessment Report (Myhre, G., D. Shindell, F.-M. Bréon, W. Collins, J. Fuglestvedt, J. Huang, D. Koch, J.-F. Lamarque, D. Lee, B. Mendoza, T. Nakajima, A. Robock, G. Stephens, T. Takemura and H. Zhang, 2013: Anthropogenic and Natural Radiative Forcing. In: Climate Change 2013: The Physical Science Basis. Contribution of Working Group I to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change [Stocker, T.F., D. Qin, G.-K. Plattner, M. Tignor, S.K. Allen, J. Boschung, A. Nauels, Y. Xia, V. Bex and P.M. Midgley (eds.)]. Cambridge University Press, Cambridge, United Kingdom and New York, NY, USA.) incorporated by reference herein, the GWP of the ingredient shall be

determined by using the 100-Year Global Warming Potential value from the IPCC's Fifth Assessment Report.

(D) For an ingredient for which no GWP value exists in the IPCC's Fourth Assessment Report or the IPCC's Fifth Assessment Report, the GWP value of the ingredient shall be zero.

(6) Ozone-forming potential shall be calculated as follows:

(A) Assignment of an ROC's Maximum Incremental Reactivity (MIR) value for the purpose of determining an Innovative Compressed Gas Propellant Product, Innovative Liquefied Propellant Product, or Representative HFC-152a Product ozone-forming potential shall be conducted pursuant to subsections 94509(r)(5)(A)-(D) and (F)-(I).

(B) For fragrance, the MIR value for terpinolene listed in section 94700 shall be used to calculate the Innovative Compressed Gas Propellant Product, Innovative Liquefied Propellant Product, or Representative HFC-152a Product ozone-forming potential.

(~~c~~d) A manufacturer shall apply in writing to the Executive Officer for any exemption claimed under this ~~sub~~section ~~(a)~~. ~~The application shall include the supporting documentation that demonstrates the reduction of emissions from the innovative product, including the actual physical test methods used to generate the data and, if necessary, the consumer testing undertaken to document product usage. In addition, the applicant must provide any information necessary to enable the Executive Officer to establish enforceable conditions for granting the exemption including the VOC content for the innovative product and test methods for determining the VOC content.~~ All information submitted by a manufacturer pursuant to this section shall be handled in accordance with the procedures specified in Title17, California Code of Regulations, Sections 91000-91022.

(1) For products that meet the criteria identified in subsections 94511(a) and (b), the application shall include the supporting documentation that demonstrates the reduction of emissions from the innovative product, including the actual physical test methods used to generate the data and, if necessary, the consumer testing undertaken to document product usage. In addition, the applicant must provide any information necessary to enable the Executive Officer to establish enforceable conditions for granting the exemption, including the VOC content for the innovative product and test methods for determining the VOC content.

(2) For products that meet the criteria identified in subsection 94511(c), the application shall include the supporting documentation that demonstrates the criteria identified in subsection (c) are met, including the name, weight percent, density, MIR, and GWP for all ingredients present in an amount greater than or equal to 0.1 percent by weight of the product formulation, and all supporting calculations or analytical measurements. In addition, the applicant must provide any information necessary, upon request of the Executive Officer, to enable the Executive Officer to establish enforceable conditions for granting the exemption, including the VOC content and ozone forming potential of the innovative product.

(e) A consumer product which reduces VOC emissions relative to the representative consumer product due to VOC combustion (including, but not limited to, catalytic combustion) shall be ineligible for any exemption provided in this section.

(~~d~~f) Within 30 days of receipt of the exemption application the Executive Officer shall determine whether an application is complete as provided in section 60030(a), Title 17, California Code of Regulations.

(~~e~~g) Within 90 days after an application has been deemed complete, the Executive Officer shall determine whether, under what conditions, and to what extent, an exemption from the requirements of Section 94509(a) will be permitted. The applicant and the Executive Officer may mutually agree to a longer time period for reaching a decision, and additional supporting documentation may be submitted by the applicant before a decision has been reached. The Executive Officer shall notify the applicant of the decision in writing and specify such terms and conditions that are necessary to ensure that emissions from the product will meet the emissions reductions specified in subsection (a), and that such emissions reductions can be enforced.

(~~f~~h) In granting an exemption for a product the Executive Officer shall establish conditions that are enforceable. These conditions shall include the VOC content of the innovative product, dispensing rates, application rates, and any other parameters determined by the Executive Officer to be necessary. The Executive Officer shall also specify the test methods for determining conformance to the conditions established. The test methods shall include criteria for reproducibility, accuracy, and sampling and laboratory procedures.

(~~g~~i) For any product for which an exemption has been granted pursuant to this section, the manufacturer shall notify the Executive Officer in writing within 30 days of any change in the product formulation or recommended product usage directions, and shall also notify the Executive Officer within 30 days if the manufacturer learns of any information which would alter the emissions

estimates submitted to the Executive Officer in support of the exemption application.

(j) *Modification of Product Ingredients for an Existing Exemption:* Where one or more ingredients in a product for which an exemption has been granted based upon the eligibility criteria in subsection (c) has been modified after the exemption has been granted, the product shall be considered a modified product and:

(1) the manufacturer must notify the Executive Officer of an ingredient modification within 30 days, but need not apply for a new exemption for the modified product if all of the following three conditions are met:

(A) The modified ingredient or ingredients meet the definition of fragrance as specified in section 94508(a)(55) and/or do not meet the definition of "Reactive Organic Compound" as specified in section 94509(r)(1)(I);

(B) The total weight of the modified ingredient or ingredients that meet the criteria in subsection (A) represent no more than 0.5 percent of the total product weight for "Hair Finishing Spray" and "Dry Shampoo," or represent no more than 2.5 percent of the total product weight for "Personal Fragrance Product"; and

(C) the modification does not increase the product's ozone forming potential or GWP.

(2) If the modified product does not meet all of the conditions in subsections 94511(j)(1)(A) through (C), the manufacturer must apply for a new exemption for the modified product pursuant to subsection 94511(d)(2). The modified product must still meet the requirements in subsection (c).

(~~h~~k) If the VOC limits specified in Section 94509(a) are lowered for a product category through any subsequent rulemaking, all innovative product exemptions granted for products in the product category, except as provided in this subsection (~~h~~k), shall have no force and effect as of the effective date of the modified VOC standard. This subsection (~~h~~k) shall not apply to innovative product exemptions granted to the following:

(1) those innovative products which have VOC emissions less than the applicable lowered VOC limit and for which a written notification of the product's emissions status versus the lowered VOC limit has been submitted to and approved by the Executive Officer at least 60 days before the effective date of such limits; and

(2) an "Automatic Aerosol Air Freshener" product subject to a 30% VOC standard pursuant to Section 94509(a).

(~~i~~l) If the Executive Officer believes that a consumer product for which an exemption has been granted no longer meets the criteria for an innovative product specified in subsection (a), the Executive Officer may modify or revoke the exemption as necessary to assure that the product will meet these criteria. The Executive Officer shall not modify or revoke an exemption without first affording the applicant an opportunity for a public hearing held in accordance with the procedures specified in Title 17, California Code of Regulations, Division 3, Chapter 1, Subchapter 1, Article 4 (commencing with Section 60040), to determine if the exemption should be modified or revoked.

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NOTE: Authority cited: Sections 39600, 39601 and 41712, Health and Safety Code. Reference: Sections 39002, 39600, 40000 and 41712, Health and Safety Code.

§ 94512. Administrative Requirements

* * * *

(f) *Record Retention Requirements for Energized Electrical Cleaner Sales Information*

(1) Beginning on January 1, 2023, all establishments identified as an "Automotive Parts and Accessories Store" or by code 441310 in NAICS, that sell, supply, or offer for sale in California, Energized Electrical Cleaner products, shall maintain any records that such establishments already routinely generate for such activity which indicate the date of sale, the name and manufacturer of the product, the quantity sold, and, the name and address of the facility or business to which the product is sold, if applicable. Said establishments shall maintain any such records for at least five years from the date of sale. Such records shall be made available within 10 business days to the Executive Officer, upon request, pursuant to subsection 94508(a)(40)(C).

For the purposes of this provision, NAICS means the North American Industry Classification System United States, 2017, Executive Office of the President, Office of Management and Budget, which is incorporated by reference herein.

* * * *

NOTE: Authority cited: Sections 39600, 39601 and 41712, Health and Safety Code. Reference: Sections 39002, 39600, 40000 and 41712, Health and Safety Code.

§ 94513. Reporting Requirements.

(a) Upon 90 days written notice, the Executive Officer may require any responsible party to report information for any consumer product or products the Executive Officer may specify including, but not limited to, all or part of the information: specified in the following subsections (a)(1) through (a)(12). If the responsible party does not have or does not provide the information requested by the Executive Officer, the Executive Officer may require the reporting of this information by the person that has the information, including, but not limited to, any formulator, manufacturer, supplier, parent company, private labeler, distributor, or repackager.

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(10) for each product brand name and form, the identity, including the specific chemical name and associated ~~Chemical Abstract Services (~~CAS~~)~~ number, of the following:

* * * *

(i) *Special Reporting requirements for Personal Fragrance Product with less than or equal to ten percent by weight of combined fragrance ingredients:*

(1) On or before March 31, 2026, each responsible party for Personal Fragrance Products shall report to the Executive Officer the following information:

(A) data regarding product sales and composition for the year 2025, including the information listed in subsections 94513(a) and (c), the VOC content of the fragrance ingredients, if requested by the Executive Officer, and the entire product label for the responsible party's products sold or offered for sale in California; and

(B) a written update on the responsible party's research and development efforts undertaken to date to achieve the 50 percent by weight VOC standard specified in section 94509(a). The report shall include the cost of reformulation efforts, and discussion of the past, planned, and ongoing research to meet the 50 percent by weight VOC standard specified in section 94509(a). The report shall provide a detailed description of the steps taken to achieve compliance, and the dates the steps were taken, including, but not limited to, the following:

i) types of formulations to be tested;

ii) formulation data;

iii) prototype testing;

iv) toxicity testing and research;

v) stability testing;

vi) expert olfactory odor testing; and

vii) consumer acceptance research.

* * * *

NOTE: Authority cited: sections 39003, 39600, 39601, 39515, 39516, 39701, 41503.5, 41511, 41700, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 39607, 40000, 41503.5, 41511, 41700, and 41712, Health and Safety Code.

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§ 94515. Test Methods.

(a)

(1) *VOC and GWP compound content determination using CARB Method 310*. Testing to determine compliance with the requirements of this article, shall be performed using California Air Resources Board Method 310, Determination of Volatile Organic Compounds (VOC) in Consumer Products and Reactive Organic Compounds (ROC) in Aerosol Coating Products, adopted September 25, 1997 and as last amended on ~~May 25, 2018~~August 1, 2022, which is incorporated herein by reference. Alternative methods which are shown to accurately determine the concentration of VOCs in a subject product or its emissions may be used upon approval of the Executive Officer.

(2) In sections 3.4, 3.5, and 3.6 of California Air Resources Board (CARB) Method 310, a process is specified for the "Initial Determination of VOC Content" and the "Final Determination of VOC Content."~~:~~ This process is an integral part of testing procedure set forth in CARB Method 310, and is reproduced below:

Sections 3.4, 3.5, and 3.6 of California Air Resources Board Method 310

3.4 *Initial Determination of VOC Content.* If t ~~T~~he Executive Officer makes a~~will determine the~~ VOC content determination, they shall do so pursuant to sections 3.2 and 3.3. Only those components with

concentrations equal to or greater than 0.1 percent by weight shallwill be reported.

3.4.1 Using the appropriate equationformula specified in section 4.0, the Executive Officer shallwill make an initial determination of whether the product meets the applicable VOC standards specified in the Consumer Products Regulations, under sections 94502 and 94509 ARB regulations. If initial results show that the product does not meet the applicable VOC standards, the Executive Officer may perform additional testing to confirm the initial results.

3.4.2 If the results obtained under section 3.4.1 show that the product does not meet the applicable VOC standards, the Executive Officer maywill request the responsible party to supply product formulation data to confirm compliance with the applicable VOC standard. The responsible party shall supply the requested information within 25 working days of the request. Information submitted to the ARB Executive Officer may be claimed as confidential.; The Executive Officer shall handle confidential such information will be handled in accordance with the confidentiality procedures specified in Title 17, CCR, Division 3, Chapter 1, Subchapter 4 (Disclosure of Public Records), sections 91000 to 91022. Failure to respond to an Executive Officer request for this information is a violation.

3.4.3 If the information supplied by the responsible party shows that the product does not meet the applicable VOC standards, If the Executive Officer determines, based on testing, information they may receive from the responsible party, and any other applicable evidence, that the product does not comply with the applicable VOC standard, then the Executive Officer will take appropriate enforcement action.

3.4.4 If the responsible party fails to provide formulation data as specified in section 3.4.2, the initial determination of VOC content under this section 3.4 shall determine if the product is in compliance with the applicable VOC standards. This determination may be used to establish a violation of ARB regulations.

3.5 Determination of the LVP-VOC status of compounds and mixtures. This section does not apply to antiperspirants and deodorants or aerosol coatings products. Effective January 1, 2015, this section also does not apply to nonaerosol "Multi-purpose Solvent" and "Paint Thinner" products sold, supplied, offered for sale, or manufactured for use in the South Coast Air Quality Management District. There is no LVP-VOC exemption for these products.

3.5.1 Formulation data. If the vapor pressure or boiling point, or both, areis unknown, the following ASTM methods, which are incorporated by reference herein, may be used to determine the LVP-VOC status of compounds and mixtures: ASTM D86-01 (Aug. 10, 2001), ASTM D850-00 (Dec. 10, 2000), ASTM D1078-01 (June 10, 2001), ASTM D2879-97 (April 10, 1997), ASTM D2887-01 (May 10, 2001), and ASTM E1719-97 (March 10, 1997).

3.5.1.1 Testing to determine vapor pressure may be performed using one of the following ASTM methods: ASTM D2879-97 (April 10, 1997), ASTM E1719-97 (March 10, 1997), or ASTM E1782-08 (March 1, 2008).

3.5.1.2 Testing to determine boiling point may be performed using one of the following ASTM methods: ASTM D86-01 (August 10, 2001), ASTM D850-00 (December 10, 2000), ASTM D1078-01 (June 10, 2001), or ASTM D2887-01 (May 10, 2001).

3.5.2 LVP-VOC status of "compounds" or "mixtures." The Executive Officer maywill test a sample of the LVP-VOC used in the product formulation to determine the boiling point for a compound or for a mixture. If the boiling point exceeds 216°C, the compound or mixture is an LVP-VOC. If the boiling point is less than 216°C, then the weight percent of the mixture which boils above 216°C is an LVP-VOC. The Executive Officer shallwill use the nearest 1 percent distillation cut that is greater than 216°C as determined under 3.56.1.2 to determine the percentage of the mixture qualifying as an LVP-VOC.

3.6 *Final Determination of VOC Content.* If a product's compliance status is not satisfactorily resolved under sections 3.4 and 3.5, the Executive Officer maywill conduct further analyses and testing as necessary based on the Executive Officer's scientific judgment to verify the formulation data.

3.6.1 If the accuracy of the supplied formulation data is verified and the product sample is determined to meet the applicable VOC standards, then no enforcement action for violation of the VOC standards will be taken.

3.6.21 If the Executive Officer is unable to verify the accuracy of the supplied formulation data, then the Executive Officer may askwill request the or responsible party to supply additional information to explain the discrepancy.

3.6.32 If there exists a discrepancy that cannot be resolved between the results of Method 310 and the supplied formulation data, then the results of Method 310 shall take precedence over the supplied formulation data. The results of Method 310 shall then determine if

the product is in compliance with the applicable VOC standards, and may be used to establish a violation of CARB regulations.

* * * *

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 41503.5, 41511, 41700, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 39607, 40000, 41503.5, 41511, 41700, and 41712, Health and Safety Code.

Proposed Amendments to the Regulation for Reducing the Ozone Formed from Aerosol Coating Product Emissions

Final Regulation Order

State of California
Air Resources Board

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Final Regulation Order

Proposed Amendments to the Regulation for Reducing the Ozone Formed from Aerosol Coating Product Emissions

Note: Amendments are shown in underline to indicate additions and ~~strikeout~~ to indicate deletions from the existing regulatory text. The symbol "* * * *" means that intervening text not proposed for amendment is not shown. [Bracketed underline text] is placeholder text for these amendment's approval date.

SUBCHAPTER 8.5. CONSUMER PRODUCTS

Amend title 17, California Code of Regulations, sections 94521, 94522, 94524, and 94526 to read as follows:

Article 3. Aerosol Coating Products

§ 94521. Definitions.

(a) For the purpose of this article, the following definitions apply:

* * * *

(27) "Executive Officer" means the Executive Officer of the California Air Resources Board (CARB or ARB)~~,~~ or ~~his or her~~their delegate .

* * * *

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41503.5, 41511, 41700, and 41712, Health and Safety Code.

§ 94522. Reactivity Limits and Requirements.

* * * *

~~(c) The Alternative Control Plan Regulation (sections 94540-94555) does not apply to aerosol coating products~~.

(~~d~~c) Sell-Through of Products

(1) Notwithstanding the provisions of section 94522(a)(2), an aerosol coating product manufactured prior to each of the effective dates specified for that product in the Table of Reactivity Limits may be sold, supplied, offered for

sale, or applied for up to three years after each of the specified effective dates. This subsection does not apply to:

(A) any aerosol coating product that does not display on the product container or package the date on which the product was manufactured, or a code indicating such date, or

(B) any aerosol coating product on which the manufacturer has used a code indicating the date of manufacture that is different than the code specified in section 94524(b)(2)(B), but an explanation of the code has not been filed with the CARB Executive Officer by the deadlines specified in section 94524(b)(2)(E)1., or section 94524(b)(2)(E)2., or

* * * *

(~~e~~d) *Prohibition on use of Methylene Chloride, Perchloroethylene, or Trichloroethylene*.

(1) No person shall sell, supply, offer for sale, apply, or manufacture for use in California any "Aerosol Coating Product" which contains methylene chloride, perchloroethylene, or trichloroethylene.

(2) The requirements of section 94522(~~e~~d)(1) shall not apply to any "Aerosol Coating Product" containing methylene chloride, perchloroethylene, or trichloroethylene that is present in a combined amount equal to or less than 0.01% by weight of the product.

(~~f~~e) *Prohibition on use of Ozone Depleting Substances*.

(1) No person shall sell, supply, offer for sale, apply, or manufacture for use in California any "Aerosol Coating Product" which contains an ozone depleting substance identified by the United States Environmental Protection Agency in the Code of Federal Regulations, 40 CFR Part 82, Subpart A, under Appendices A and B, July 1, 1998.

(2) The requirements of section 94522(~~f~~e)(1) shall not apply to any aerosol coating product containing an ozone depleting substance as identified in section 94522(~~f~~e)(1) that is present in a combined amount equal to or less than 0.01% by weight of the product.

(~~g~~f) *Multi-component Kits.*

No person shall sell, supply, offer for sale, apply, or manufacture for use in California any "Multi-component Kit," as defined in section 94521, in which the Kit PWMIR is greater than the Total Reactivity Limit. The Total Reactivity Limit

represents the limit that would be allowed in the "Multi-component Kit" if each component product in the kit had separately met the applicable Reactivity Limit. The Kit PWMIR and Total Reactivity Limit are calculated as in equations (1), (2), and (3) below:

(1) Kit PWMIR = $(PWMIR_{(1)} \times W_1) + (PWMIR_{(2)} \times W_2) + \ldots + (PWMIR_{(n)} \times W_n)$

(2) Total Reactivity Limit = $(RL_1 \times W_1) + (RL_2 \times W_2) + \ldots + (RL_n \times W_n)$

(3) Kit PWMIR $\leq$ Total Reactivity Limit

Where:

W = the weight of the product contents (excluding container)
RL = the Reactivity Limit specified in section 94522(a)
Subscript 1 denotes the first component product in the kit
Subscript 2 denotes the second component product in the kit

Subscript n denotes any additional component product

(~~h~~g) *Products Assembled by Adding Bulk Paint to Aerosol Containers of Propellant.*

No person shall sell, supply, offer for sale, apply, or manufacture for use in the State of California any "Aerosol Coating Product" assembled by adding bulk paint to aerosol containers of "Propellant," unless such products comply with the applicable reactivity limits specified in section 94522(a).

(~~i~~h) *Assignment of Maximum Incremental Reactivity (MIR) Values.*

(1) All ingredients in an amount equal to or exceeding 0.1 percent by weight shall be used to calculate the PWMIR.

(2) In order to calculate the PWMIR of an "Aerosol Coating Product" as specified in section 94521(a)(64), the MIR values of product ingredients are assigned as follows:

(A) Any ingredient which does not contain carbon is assigned a MIR value of 0.0.

(B) "Coating Solid," "Extender," and "Plasticizer" ingredients are assigned a MIR value of 0.0. "Antimicrobial Compound" ingredients in an amount of up to 0.25 percent by weight and "Fragrance" in an amount of up to 0.25 percent by weight are assigned a MIR value of 0.0.

(C) For any ROC not covered under (2)(A) and (2)(B) of this subsection (~~i~~h), each ROC is assigned the MIR value for that ROC as set forth in Subchapter 8.6, Article 1, section 94700 or 94701, Title 17, California Code of Regulations.

(D) If a ROC is not listed in section 94700, Title 17, California Code of Regulations, but an isomer(s) of the ROC is listed, then the MIR value for the isomer shall be used. If more than one isomer is listed, the listed MIR value for the isomer with the highest MIR value shall be used.

(E) Except as provided in subsection (~~i~~h)(4), if a ROC or its isomer(s) is not listed in section 94700 or an aliphatic hydrocarbon solvent is not listed in section 94701, Title 17, California Code of Regulations, the MIR value for 1,2,3-trimethyl benzene shall be used to determine the weighted MIR of the ROC to calculate the PWMIR.

(F) "Fragrance" present in an aerosol coating in an amount exceeding 0.25 percent by weight shall use the MIR value for terpinolene to determine the weighted MIR of the "Fragrance" to calculate the PWMIR.

(3)

(A)

1. For products manufactured before January 1 2015: The MIR values dated July 18, 2001, shall be used to calculate the PWMIR for aerosol coating products.

2. For products manufactured on or after January 1, 2015: The MIR values dated October 2, 2010, shall be used to calculate the PWMIR for aerosol coating products, and these MIR values shall not be changed until at least January 1, 2020.

(B) If a new ROC is added to section 94700 or 94701, the MIR value for the new ROC shall be used instead of the value specified in section 94522(~~i~~h)(2)(D) or (E) to calculate the PWMIR after the effective date of the MIR value.

(4) The MIR value for any aromatic hydrocarbon solvent with a boiling range different from the ranges specified in section 94701(b) shall be assigned as follows:

(A) If the solvent dry point is lower than or equal to 420° F, the MIR value specified in section 94701(b) for bin 23 shall be used.

(B) If the solvent initial boiling point is higher than 420° F, the MIR value specified in section 94701(b) for bin 24 shall be used.

* * * *

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 41503.5, 41511, 41700, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 39607, 39701, 40000, 41503.5, 41504, 41511, 41700, and 41712, Health and Safety Code.

* * * *

§ 94524. Administrative Requirements.

* * * *

(E) Additional Product Dating Requirements

1. If a manufacturer uses a code indicating the date of manufacture, for any aerosol coating product subject to section 94522 an explanation of the code must be filed with the Executive Officer of the CARB no later than twelve months prior to use of the code or abbreviation. Thereafter, manufacturers using a code must file an explanation of the code with the Executive Officer on an annual basis, beginning January 1, 2015.

* * * *

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, 41700, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94526. Test Methods and Compliance Verification.

(a) *Test Methods*

Compliance with the requirements of this article shall be determined by using the following test methods, which are incorporated by reference herein. Alternative test methods which are shown to accurately determine the PWMIR, ingredient name and weight percent of each ingredient, metal content, specular gloss, or acid content may also be used after approval in writing by the Executive Officer:

(1) The ingredients and the amount of each ingredient of all aerosol coating products subject to the provisions of this article shall be determined by the procedures set forth in "California Air Resources Board Method 310, Determination of Volatile Organic Compounds (VOC) in Consumer Products and Reactive Organic Compounds (ROC) in Aerosol Coating

Products," (Method 310) adopted September 25, 1997, and as last amended on ~~August 1, 2014~~August, 1, 2022, which is incorporated herein by reference. Only ingredients present in amount equal to or greater than 0.1 percent by weight will be reported.

(2) Metal Content. The metal content of metallic aerosol coating products shall be determined by ASTM D5381-93, Standard Guide for X-Ray Fluorescence (XRF) Spectroscopy of Pigments and Extenders (Reapproved July 1, 2014), which is incorporated by reference herein.

(3) Specular Gloss. Specular gloss of flat and non-flat coatings shall be determined by ASTM D523-08, Standard Test Method for Specular Gloss (June 1, 2008), which is incorporated by reference herein.

(4) Acid Content. The acid content of rust converters shall be determined by ASTM D1613-06, Standard Test Method for Acidity in Volatile Solvents and Chemical Intermediates Used in Paint, Varnish, Lacquer, and Related Products (April 1, 2006), which is incorporated by reference herein.

(b) *Compliance Verification*

(1) Upon written notification from the Executive Officer, the Responsible Party shall have 25 working days from the date of mailing to provide to the Executive Officer the exact product formulation and any other information necessary to determine compliance for products selected for testing:

(A) For the purpose of this subsection, formulation means the exact weight fraction of all ingredients including: each ROC, water, "Antimicrobial Compound," "Coating Solid," "Extender," "Plasticizer," and any compounds assigned a MIR value of zero as specified in section 94522(i).

1. Each ROC must be reported as an ingredient if it is present in an amount greater than or equal to 0.1 percent by weight of the final aerosol coating formulation. If an individual ROC is present in an amount less than 0.1 percent by weight, then it does not need to be reported as an ingredient.

2. Each hydrocarbon solvent must be reported as an ingredient if it is present in an amount greater than or equal to 0.1 percent by weight of the final aerosol coating formulation. The solvent Bin number must be specified.

3. Any ROC constituent of any raw material must be reported as an ingredient if it is present in an amount greater than or equal to 0.1 percent by weight of the final aerosol coating formulation.

This means, for example, that any ROC included in a resin or other raw material must be reported as part of the formulation.

4. Hydrocarbon propellant ingredients must be specified and reported separately. In other words, the portion of the hydrocarbon propellant that is propane, butane, isobutane, or any other ROC must be reported as an ingredient.

5. A ~~material~~ safety data sheet (~~M~~SDS) does not constitute a product's formulation.

* * * *

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, 41700, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 39607, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

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Proposed Amendments to the Alternative Control Plan Regulation for Consumer Products ~~and Aerosol Coating Products~~

Final Regulation Order

State of California
Air Resources Board

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Final Regulation Order

Proposed Amendments to the Alternative Control Plan Regulation for Consumer Products ~~and Aerosol Coating Products~~

Note: Amendments are shown in underline to indicate additions and ~~strikeout~~ to indicate deletions from the existing regulatory text.

SUBCHAPTER 8.5. CONSUMER PRODUCTS

Amend title 17, California Code of Regulations, sections 94540 - 94555 to read as follows:

Article 4. Alternative Control Plan

§ 94540. Purpose

The purpose of this article is to provide an alternative method to comply with the VOC standards for consumer products ~~and aerosol coating products~~ that are specified in Title 17, California Code of Regulations~~, Division 3, Chapter 1, Subchapter 8.5, Articles 2 and 3~~, sections 94507-94517 ~~and 94520-94528~~. This alternative is provided by allowing responsible ACP parties the option of voluntarily entering into separate "alternative control plans" (ACPs) for consumer products ~~and aerosol coating products~~, as specified in this article.

NOTE: Authority cited: Sections 39600, 39601, 41503.5, 41700, and 41712, Health and Safety Code. Reference: Sections 39000, 39002, 39003, 39600, 39602, 40000, 41503.5, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94541. Applicability

Only responsible ACP parties for consumer products ~~or aerosol coating products~~ may enter into an ACP. An ACP shall include only those consumer products ~~or only those aerosol coating products~~ which are subject to the VOC standards specified in section~~s~~ 94509 ~~or 94522~~, Title 17, California Code of Regulations. ~~Consumer products and aerosol coating products shall not be included together in the same ACP.~~

NOTE: Authority cited: Sections 39600, 39601, 39515, 39516, 41503.5, 41511, 41700, and 41712, Health and Safety Code. Reference: Sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94542. Definitions

(a) For the purposes of this article, the following definitions shall apply:

(1) "ACP Emissions" means the sum of the VOC emissions from every ACP product subject to an Executive Order approving an ACP, during the compliance period specified in the Executive Order, expressed to the nearest pound of VOC and calculated according to the following equation

$$ACP\ Emissions = (Emissions\ )_1 + (Emissions\ )_2 + \ldots + (Emissions\ )_N$$

where,

$$Emissions = \frac{[VOC\ Content]\ x\ [Enforceable\ Sales]}{100}$$

For all products except for charcoal lighter material products ~~and aerosol coating products~~:

$$VOC\ Content = \frac{[(B - C)\ x100]}{A}$$

A = net weight of unit (excluding container and packaging)

B = total weight of all VOCs per unit, as defined in subsection (a)(31) of this section

C = total weight of all exempted VOCs per unit, as specified in section 94510

For charcoal lighter material products only:

$$VOC\ Content = \frac{[Certified\ \ Emissions\ x100]}{Certified\ Use\ Rate}$$

Certified Emissions = the emissions level for products approved by the Executive Officer under section 94509(h), as determined pursuant to South

Coast Air Quality Management District Rule 1174 Ignition Method
Compliance Certification Protocol (Feb. 27, 1991), expressed to the nearest 0.001 pound CH_2 per start.

Certified Use Rate = the usage level for products approved by the Executive Officer under section 94509(h), as determined pursuant to South Coast Air Quality Management District Rule 1174 Ignition Method Compliance Certification Protocol (Feb. 27, 1991), expressed to the nearest 0.001 pound certified product used per start.

~~For aerosol coating products only:~~

~~VOC Content = Percent VOC By Weight~~

~~"Percent VOC By Weight" shall have the same meaning as defined in section 94521(a)(46);~~

For all products to which this Article applies:

Enforceable Sales = the total amount of an ACP product sold for use in California, during the applicable compliance period specified in the Executive Order approving an ACP, as determined through enforceable sales records (expressed to the nearest pound, excluding container and packaging).

1,2,...N = each product in an ACP up to the maximum N.

(2) "ACP Limit" means the maximum allowable ACP Emissions during the compliance period specified in an Executive Order approving an ACP, expressed to the nearest pound of VOC and calculated according to the following equation:

$$ACP\ Limit = (Limit\ )_1 + (Limit\ )_2 + \ldots + (Limit\ )_N$$

where,

$$Limit = \frac{[ACP\ Standard] \times [Enforceable\ Sales]}{100}$$

Enforceable Sales = the total amount of an ACP product sold for use in California, during the applicable compliance period specified in the Executive Order approving an ACP, as determined through enforceable sales records (expressed to the nearest pound, excluding container and packaging).

ACP Standard = either the ACP product's Pre-ACP VOC Content, or the applicable VOC standard specified in sections 94509 ~~or 94522~~, whichever is the lesser of the two.

Pre-ACP VOC Content = the lowest VOC content which the ACP product had between January 1, 1990 and the date on which the application for a proposed ACP is submitted to the Executive Officer, based on either the data on the product obtained from the March 12, 1991 Air Resources Board Consumer Products Survey, ~~the data on the product obtained from the February 25, 1993 Air Resources Board Aerosol Paint Survey,~~ or other accurate records available to the Executive Office, whichever yields the lowest VOC content for the product.

1,2,...N = each product in an ACP up to the maximum N.

(3) "ACP Product" means any "consumer product" ~~or any "aerosol coating product"~~ subject to the VOC standards specified in section~~s~~ 94509 ~~or 94522~~, except those products that have been exempted under section~~s~~ 94510 ~~or 94523~~, or exempted as Innovative Products under section 94511.

(4) "ACP Reformulation" or "ACP Reformulated" means the process of reducing the VOC Content of an ACP product, within the period that an ACP is in effect, to a level which is less than the current VOC content of the product.

(5) "ACP Standard" means either the ACP product's Pre-ACP VOC Content or the applicable VOC standard specified in section~~s~~ 94509 ~~or 94522~~, whichever is the lesser of the two.

(6) "Alternative Control Plan" or "ACP" means any emissions averaging program approved by the Executive Officer pursuant to the provisions of this article.

(7) "Compliance Period" means the period of time, not to exceed one year, for which the ACP Limit and ACP Emissions are calculated and for which

compliance with the ACP Limit is determined, as specified in the Executive Order approving an ACP.

(8) "Contact Person" means a representative(s) that has been designated by the responsible ACP party for the purpose of reporting or maintaining any information specified in the Executive Order approving an ACP.

(9) "Date-Code" means the day, month and year on which the ACP product was manufactured, filled, or packaged, or a code indicating such a date.

(10) "Enforceable Sales" means the total amount of an ACP product sold for use in California, during the applicable compliance period specified in the Executive Order approving an ACP, as determined through enforceable sales records (expressed to the nearest pound, excluding product container and packaging).

(11) "Enforceable Sales Record" means a written, point-of-sale record or any other Executive Officer-approved system of documentation from which the mass, in pounds (less product container and packaging), of an ACP product sold to the end user in California during the applicable compliance period can be accurately documented. For the purposes of this article, "enforceable sales records" include, but are not limited to, the following types of records:

(A) accurate records of direct retail or other outlet sales to the end user during the applicable compliance period;

(B) accurate compilations, made by independent market surveying services, of direct retail or other outlet sales to the end users for the applicable compliance period, provided that a detailed method which can be used to verify any data comprising such summaries is submitted by the responsible ACP party and approved by the Executive Officer;

(C) any other accurate product sales records approved by the Executive Officer as meeting the criteria specified in this subsection (a)(11).

(D) for pesticides only, accurate mill assessment records for economic poisons, verified by the California Department of Pesticide Regulations, which cover the sales of ACP pesticide products during the applicable compliance period.

(12) "Executive Order" means the document signed by the Executive Officer which includes the conditions and requirements of the ACP,

and which allows manufacturers to sell ACP products in California pursuant to the requirements of this article.

(13) "Gross California Sales" means the estimated total California sales of an ACP product during a specific compliance period (expressed to the nearest pound), based on either of the following methods, whichever the responsible ACP party demonstrates to the satisfaction of the Executive Officer will provide an accurate California sales estimate:

(A) apportionment of national or regional sales of the ACP product to California sales, determined by multiplying the average national or regional sales of the product by the fraction of the national or regional population, respectively, that is represented by California's current population; or

(B) any other documented method which provides an accurate estimate of the total current California sales of the ACP product.

(14) "LVP" or "LVP Compound" ~~means a low vapor pressure VOC which:~~shall have the same meaning as "LVP-VOC," as defined in section 94508(a).

~~(A) has a vapor pressure less than 0.1 mm Hg at 20 degrees Centigrade, or~~

(B) ~~if the vapor pressure is unknown, has more than 12 carbon atoms~~.

(15) "LVP Content" means the total weight, in pounds, of LVP compounds in an ACP product multiplied by 100 and divided by the product's total net weight (in pounds, excluding container and packaging), expressed to the nearest 0.1.

(16) "Missing Data Days" means the number of days in a compliance period for which the responsible ACP party has failed to provide the required Enforceable Sales or VOC Content data to the Executive Officer, as specified in the Executive Order approving an ACP.

(17) "One-product business" means a responsible ACP party which sells, supplies, offers for sale, or manufactures for use in California:

(A) only one distinct ACP product, sold under one product brand name, which is subject to the requirements of section~~s~~ 94509 ~~or 94522~~, or

(B) only one distinct ACP product line subject to the requirements of section~~s~~ 94509 ~~or 94522~~, in which all the ACP products belong to the same product category(ies) and the VOC Contents in the

products are within 98.0% and 102.0% of the arithmetic mean of the VOC Contents over the entire product line.

(18) "Pre-ACP VOC Content" means the lowest VOC content of an ACP product between January 1, 1990 and the date on which the application for a proposed ACP is submitted to the Executive Officer, based on either the data on the product obtained from the March 12, 1991 Air Resources Board Consumer Products Survey~~, the data on the product obtained from the February 25, 1993 Air Resources Board Aerosol Paint Survey,~~ or other accurate records available to the Executive Officer, whichever yields the lowest VOC content for the product.

(19) "Product Line" means a group of products of identical form and function belonging to the same product category(ies).

(20) "Reconcile" or "Reconciliation" means to provide sufficient VOC emission reductions to completely offset any shortfalls generated under the ACP during an applicable compliance period.

(21) "Reconciliation of Shortfalls Plan" means the plan to be implemented by the responsible ACP party when shortfalls have occurred, as approved by the Executive Officer pursuant to section 94543(a)(7)(J).

(22) "Responsible ACP Party" means the company, firm or establishment which is listed on the ACP product's label. If the label lists two or more companies, firms, or establishments, the "responsible ACP party" is the party which the ACP product was "manufactured for" or "distributed by", as noted on the label.

(23) "Retail Outlet" means any establishment at which consumer products are sold, supplied, or offered for sale directly to consumers.

(24) "Shortfall" means the ACP Emissions minus the ACP Limit when the ACP Emissions were greater than the ACP Limit during a specified compliance period, expressed to the nearest pound of VOC. "Shortfall" does not include emissions occurring prior to the date that the Executive Order approving an ACP is signed by the Executive Officer.

(25) "Small Business" shall have the same meaning as defined in Government Code Section 11342(h).

(26) "Surplus Reduction" means the ACP Limit minus the ACP Emissions when the ACP Limit was greater than the ACP Emissions during a given compliance period, expressed to the nearest pound of VOC. Except as provided in section 94547(c), "Surplus Reduction" does not include

emissions occurring prior to the date that the Executive Order approving an ACP is signed by the Executive Officer.

(27) "Surplus Trading" means the buying, selling, or transfer of Surplus Reductions between responsible ACP parties.

(28) "Total Maximum Historical Emissions" (TMHE), means the total VOC emissions from all ACP products for which the responsible ACP party has failed to submit the required VOC Content or Enforceable Sales records. The TMHE shall be calculated for each ACP product during each portion of a compliance period for which the responsible ACP has failed to provide the required VOC Content or Enforceable Sales records. The TMHE shall be expressed to the nearest pound and calculated according to the following calculation:

$$TMHE = (MHE)_1 + (MHE)_2 + \ + (MHE)_N$$

$$MHE = [\frac{Highest\ VOC\ Content\ x\ Highest\ Sales}{100\ x\ 365}]\ x\ Missing\ Data\ Days$$

where,

Highest VOC Content = the maximum VOC content which the ACP product has contained in the previous 5 years, if the responsible ACP party has failed to meet the requirements for reporting VOC Content data (for any portion of the compliance period), as specified in the Executive Order approving the ACP, or the current actual VOC Content, if the responsible ACP party has provided all required VOC Content data (for the entire compliance period), as specified in the Executive Order.

Highest Sales = the maximum one-year Gross California Sales of the ACP product in the previous 5 years, if the responsible ACP party has failed to meet the requirements for reporting Enforceable Sales records (for any portion of the compliance period), as specified in the Executive Order approving the ACP, or the current actual one-year Enforceable Sales for the product, if the responsible ACP party has provided all required Enforceable Sales records (for the entire compliance period), as specified in the Executive Order approving the ACP.

Missing Data

Days = the number of days in a compliance period for which the responsible ACP party has failed to provide the required Enforceable Sales or VOC Content data as specified in the Executive Order approving an ACP.

1, 2, ..., N = each product in an ACP, up to the maximum N, for which the responsible ACP party has failed to submit the required Enforceable Sales or VOC Content data as specified in the Executive Order approving an ACP.

(29) "VOC Content" means the total weight of VOC in a product, expressed to the nearest 0.1 pounds of VOC per 100 pounds of product and calculated according to the following equation:

For all products except for charcoal lighter material products ~~and aerosol coating products~~:

$$VOC\ Content = \frac{[(B - C) \times 100]}{A}$$

A = net weight of unit (excluding container and packaging)

B = total weight of all VOCs per unit, as defined in section 94542(a)(31)

C = total weight of all exempted VOCs per unit, as specified in section 94510

For charcoal lighter material products only,

$$VOC\ Content = \frac{[Certified\ Emissions \times 100]}{Certified\ Use\ Rate}$$

Certified Emissions = the emissions level for products approved by the Executive Officer under section 94509(h), as determined pursuant to South Coast Air Quality Management District Rule 1174 Ignition Method
Compliance Certification Protocol (Feb. 27, 1991), expressed to the nearest 0.001 pound CH_2 per start.

Certified Use Rate = the usage level for products approved by the Executive Officer under section 94509(h), as determined pursuant to South Coast Air Quality Management District Rule 1174 Ignition Method

Compliance Certification Protocol (Feb. 27, 1991), expressed to the nearest 0.001 pound certified product used per start.

~~For aerosol coating products only: VOC Content = Percent VOC By Weight~~

~~"Percent VOC By Weight" shall have the same meaning as defined in section 94521(a)(46).~~

(30) "VOC Standard" means the maximum allowable VOC content for an ACP product, determined as follows:

(A) the applicable VOC Standard specified in section~~s~~ 94509~~ or 94522~~, for all ACP products except for charcoal lighter material;

(B) for charcoal lighter material products only, the VOC Standard for the purposes of this article shall be calculated according to the following equation:

$$VOC\ Standard = \frac{[0.020\ pound\ CH_2\ per\ start \times 100]}{Certified\ Use\ Rate}$$

where,

0.020 = the certification emissions level for the Executive Officer-approved product, as specified in section 94509(h).

Certified Use Rate = the usage level for products approved by the Executive Officer under section 94509(h), as determined pursuant to South Coast Air Quality Management District Rule 1174 Ignition Method Compliance Certification Protocol (Feb. 27, 1991), expressed to the nearest 0.001 pound certified product used per start.

(31) "Volatile Organic Compound" or "VOC" shall have the same meaning as defined in section 94508(a).

(32) "Working Day" means any day between Monday through Friday, inclusive, except for days that are federal holidays.

(a) The definitions set forth in section~~s~~ 94508~~ and 94521~~, Title 17, California Code of Regulations, shall also apply to this article.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94543. Requirements and Process for Approval of an ACP

(a) To be considered by the Executive Officer for approval, an application for a proposed ACP shall be submitted in writing to the Executive Officer by the responsible ACP party and shall contain all of the following:

(1) an identification of the contact persons, phone numbers, names and addresses of the responsible ACP party which is submitting the ACP application and will be implementing the ACP requirements specified in the Executive Order;

(2) a statement of whether the responsible ACP party is a small business or a one-product business, as defined in section 94542(a)(17) and (25);

(3) a listing of the exact product brand name, form, available variations (flavors, scents, colors, sizes, etc.), and applicable product category(ies) for each distinct ACP product that is proposed for inclusion in the ACP;

(4) for each proposed ACP product identified in subsection (a)(3) of this section, a demonstration to the satisfaction of the Executive Officer that the enforceable sales records to be used by the responsible ACP party for tracking product sales meet the minimum criteria specified in subsection (a)(4)(E) of this section. To provide this demonstration, the responsible ACP party shall do all of the following:

(A) provide the contact persons, phone numbers, names, street and mail addresses of all persons and businesses who will provide information that will be used to determine the Enforceable Sales;

(B) determine the Enforceable Sales of each product using enforceable sales records as defined in section 94542(a)(11);

(C) demonstrate, to the satisfaction of the Executive Officer, the validity of the Enforceable Sales based on enforceable sales records provided by the contact persons or the responsible ACP party;

(D) calculate the percentage of the Gross California Sales, as defined in section 94542 (a)(13) which is comprised of Enforceable Sales;

(E) determine which ACP products have Enforceable Sales which are 75.0% or more of the Gross California Sales. Only ACP products meeting this criteria shall be allowed to be sold in California under an ACP.

(5) for each of the ACP products identified in subsection (a)(4)(E) of this section, the inclusion of the following:

(A) legible copies of the existing labels for each product;

(B) the VOC Content and LVP Content for each product. The VOC Content and LVP Content shall be reported for two different periods, as follows:

1. the VOC and LVP contents of the product at the time the application for an ACP is submitted, and

2. any VOC and LVP contents of the product, which have occurred at any time within the four years prior to the date of submittal of the application for an ACP, if either the VOC or LVP contents have varied by more than plus/minus ten percent (± 10.0%) of the VOC or LVP Contents reported in subsection (a)(5)(B)1., of this section.

(6) a written commitment obligating the responsible ACP party to date-code every unit of each ACP product approved for inclusion in the ACP. The commitment shall require the responsible ACP party to display the date- code on each ACP product container or package no later than 5 working days after the date an Executive Order approving an ACP is signed by the Executive Officer.

(7) an operational plan covering all the products identified under subsection (a)(4)(E) of this section for each compliance period that the ACP will be in effect. The operational plan shall contain all of the following:

(A) an identification of the compliance periods and dates for the responsible ACP party to report the information required by the Executive Officer in the Executive Order approving an ACP. The length of the compliance period shall be chosen by the responsible ACP party provided,

however, that no compliance period shall be longer than 365 days. The responsible ACP party shall also choose the dates for reporting information such that all required VOC Content and Enforceable Sales data for all ACP products shall be reported to the Executive Officer at the same time and at the same frequency;

(B) an identification of specific enforceable sales records to be provided to the Executive Officer for enforcing the provisions of this article and the Executive Order approving an ACP. The enforceable sales records shall be provided to the Executive Officer no later than the compliance period dates specified in subsection (a)(7)(A) of this section;

(C) for a small business or a one-product business which will be relying to some extent on Surplus Trading to meet its ACP Limits, a written commitment from the responsible ACP party(ies) that they will be transfer the Surplus Reductions to the small business or one-product business upon approval of the ACP;

(D) for each ACP product, all VOC content levels which will be applicable for the ACP product during each compliance period. The plan shall also identify the specific method(s) by which the VOC Content will be determined and the statistical accuracy and precision (repeatability and reproducibility) calculated for each specified method.

(E) the projected Enforceable Sales for each ACP product at each different VOC Content for every compliance period that the ACP will be in effect;

(F) a detailed demonstration showing the combination of specific ACP reformulations or Surplus Trading (if applicable) that is sufficient to ensure that the ACP Emissions will not exceed the ACP Limit for each compliance period that the ACP will be in effect, the approximate date within each compliance period that such reformulations or Surplus Trading are expected to occur, and the extent to which the VOC Contents of the ACP products will be reduced (i.e., by ACP reformulation). This demonstration shall use the equations specified in section 94542(a)(1) and (a)(2) for projecting the ACP Emissions and ACP Limits during each compliance period. This demonstration shall also include all VOC Content levels and

projected Enforceable Sales for all ACP products to be sold in California during each compliance period;

(G) a certification that all reductions in the VOC Content of a product will be real, actual reductions that do not result from changing product names, mischaracterizing ACP product reformulations that have occurred in the past, or any other attempts to circumvent the provisions of this article;

(H) written explanations of the date-codes that will be displayed on each ACP product's container or packaging;

(I) a statement of the approximate dates by which the responsible ACP party plans to meet the applicable VOC standards for each product in the ACP;

(J) an operational plan ("reconciliation of shortfalls plan") which commits the responsible ACP party to completely reconcile any shortfalls in any and all cases, even, to the extent permitted by law, if the responsible ACP party files for bankruptcy protection. The plan for reconciliation of shortfalls shall contain all of the following:

1. a clear and convincing demonstration of how shortfalls of up to 5%, 10%, 15%, 25%, 50%, 75% and 100% of the applicable ACP Limit will be completely reconciled within 90 working days from the date the shortfall is determined;

2. a listing of the specific records and other information that will be necessary to verify that the shortfalls were reconciled as specified in this subsection (a)(7)(J);

3. a commitment to provide any record or information requested by the Executive Officer to verify that the shortfalls have been completely reconciled.

(8) a declaration, signed by a legal representative for the responsible ACP party, which states that all information and operational plans submitted with the ACP application are true and correct.

(b)

(1) In accordance with the time periods specified in section 94544, the Executive Officer shall issue an Executive Order approving an ACP which meets the requirements of this article. The Executive Officer shall

specify such terms and conditions as are necessary to ensure that the emissions from the ACP products do not exceed the emissions that would have occurred if the ACP products subject to the ACP had met the VOC standards specified in section 94509 ~~or the VOC standards specified in section 94522, whichever are applicable~~. The ACP shall also include:

(A) only those ACP products for which the Enforceable Sales are at least 75.0% of the Gross California Sales, as determined in subsection (a)(4)(E) of this section;

(B) a reconciliation of shortfalls plan meeting the requirements of this article; (C) operational terms, conditions, and data to be reported to the Executive Officer to ensure that all requirements of this article are met.

(2) The Executive Officer shall not approve an ACP submitted by a responsible ACP party if the Executive Officer determines, upon review of the responsible ACP party's compliance history with past or current ACPs or the requirements for consumer products ~~or the requirements for aerosol coating products~~ (specified in sections 94507-94517 ~~and sections 94520-94528~~, Title 17, California Code of Regulations), that the responsible ACP party has a recurring pattern of violations and has consistently refused to take the necessary steps to correct those violations.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94544. ACP Approval Timeframes

(a) The Executive Officer shall take appropriate action on an ACP within the following time periods:

(1) Within 30 working days of receipt of an ACP application, the Executive Officer shall inform the applicant in writing that either:

(A) the application is complete and accepted for filing, or

(B) the application is deficient, and identify the specific information required to make the application complete.

(2) Within 30 working days of receipt of additional information provided in response to a determination that an ACP application is deficient, the Executive Officer shall inform the applicant in writing that either:

(A) the additional information is sufficient to make the application complete, and the application is accepted for filing, or

(B) the application is deficient, and identify the specific information required to make the application complete.

(3) If the Executive Officer finds that an application meets the requirements of section 94543 of this article, then he or she shall issue an Executive Order in accordance with the requirements of this article. The Executive Officer shall act to approve or disapprove a complete application within 90 working days after the application is deemed complete.

(b) Before the end of each time period specified in this section, the Executive Officer and the responsible ACP party may mutually agree to a longer time period for the Executive Officer to take the appropriate action.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94545. Recordkeeping and Availability of Requested Information

(a) All information specified in the Executive Order approving an ACP shall be maintained by the responsible ACP party for a minimum of three years after such records are generated. Such records shall be clearly legible and maintained in good condition during this period.

(b) The records specified in subsection (a) of this section shall be made available to the Executive Officer or his or her authorized representative:

(1) immediately upon request, during an on-site visit to a responsible ACP party, or

(2) within five working days after receipt of a written request from the Executive Officer, or

(3) within a time period mutually agreed upon by both the Executive Office and the responsible ACP party.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94546. Violations

(a) Any person who commits a violation of this article is subject to the penalties specified in Health and Safety Code, section 42400 et seq. Failure to meet any requirement of this article or any condition of an applicable Executive Order shall constitute a single, separate violation of this article for each day until such requirement or condition is satisfied, except as otherwise provided in subsections (b) through (h) of this section.

(b) False reporting of any information contained in an ACP application, or any supporting documentation or amendments thereto, shall constitute a single, separate violation of the requirements of this article for each day that the approved ACP is in effect.

(c) Any exceedance during the applicable compliance period of the VOC content specified for an ACP product in the Executive Order approving an ACP shall constitute a single, separate violation of the requirements of this article for each ACP product which exceeds the specified VOC Content that is sold, supplied, offered for sale, or manufactured for use in California.

(d) Any of the following actions shall each constitute a single, separate violation of the requirements of this article for each day after the applicable deadline until the requirement is satisfied:

(1) Failure to report data (i.e., "missing data") or failure to report data accurately (i.e., "inaccurate data") in writing to the Executive Officer regarding the VOC content, LVP Content, Enforceable Sales, or any other information required by any deadline specified in the applicable Executive Order;

(2) False reporting of any information submitted to the Executive Officer for determining compliance with the ACP requirements;

(3) Failure to completely implement the reconciliation of shortfalls plan that is set forth in the Executive Order, within 30 working days from the date of written notification of a shortfall by the Executive Officer;

(4) Failure to completely reconcile the shortfall as specified in the Executive Order, within 90 working days from the date of written notification of a shortfall by the Executive Officer.

(e) False reporting or failure to report any of the information specified in section 94547(b)(9), or the sale or transfer of invalid Surplus Reductions, shall constitute a single, separate violation of the requirements of this article for each day during the time period for which the Surplus Reductions are claimed to be valid.

(f) Except as provided in subsection (g) of this section, any exceedance of the ACP Limit for any compliance period that the ACP is in effect shall constitute a single, separate violation of the requirements of this article for each day of the applicable compliance period. The Executive Officer shall determine whether an exceedance of the ACP Limit has occurred as follows:

(1) If the responsible ACP party has provided all required information for the applicable compliance period specified in the Executive Order approving an ACP, then the Executive Officer shall determine whether an exceedance has occurred using the Enforceable Sales records and VOC Content for each ACP product, as reported by the responsible ACP party for the applicable compliance period;

(2) If the responsible ACP party has failed to provide all the required information specified in the Executive Order for an applicable compliance period, the Executive Officer shall determine whether an exceedance of the ACP Limit has occurred as follows:

(A) for the missing data days, the Executive Officer shall calculate the total maximum historical emissions, as specified in section 94542(a)(28);

(B) for the remaining portion of the compliance period which are not missing data days, the Executive Officer shall calculate the emissions for each ACP product using the Enforceable Sales records and VOC Content that were reported for that portion of the applicable compliance period;

(C) the ACP Emissions for the entire compliance period shall be the sum of the total maximum historical emissions, determined pursuant to subsection (f)(2)(A), and the emissions determined pursuant to subsection (f)(2)(B);

(D) the Executive Officer shall calculate the ACP Limit for the entire compliance period using the ACP Standards applicable to each ACP product and the Enforceable Sales records specified in subsection (f)(2)(B). The Enforceable Sales for each ACP Product during missing data days, as specified in subsection (f)(2)(A), shall be zero (0);

(E) an exceedance of the ACP Limit has occurred when the ACP Emissions, determined pursuant to subsection (f)(2)(C), exceeds the ACP Limit, determined pursuant to subsection (f)(2)(D).

(g) If a violation specified in subsection (f) of this section occurs, the responsible ACP party may, pursuant to this paragraph, establish the number of violations as calculated according to the following equation:

$$NEV = (\text{ACP Emissions} - \text{ACP Limit}) \times \frac{1 \text{ violation}}{40 \text{ pounds}}$$

where,

NEV = number of ACP Limit violations

ACP Emissions = the ACP Emissions for the compliance period

ACP Limit = the ACP Limit for the compliance period

The responsible ACP party may determine the number of ACP Limit violations pursuant to this paragraph only if it has provided all required information for the applicable compliance period, as specified in the Executive Order approving the ACP. By choosing this option, the responsible ACP party waives any and all legal objections to the calculation of the ACP Limit violations pursuant to this subsection (g).

(h) Each failure to comply with any provision of Method 310 or any other required test method, or to supply information required by those methods, is a separate violation.

~~(h)~~(i) In assessing the amount of penalties for any violation occurring pursuant to subsections (a) - (~~g~~h) of this section, the circumstances identified in Health and Safety Code section 42403(b) shall be taken into consideration.

~~(i)~~(j) A cause of action against a responsible ACP party under this section shall be deemed to accrue on the date(s) when the records establishing a violation are received by the Executive Officer.

~~(j)~~(k) The responsible ACP party is fully liable for compliance with the requirements of this article, even if the responsible ACP party contracts with or otherwise relies on another person to carry out some or all of the requirements of this article.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600,

39602, 40000, 41504, 41511, 41700, 41712, 42400-42403 and 42404.5, Health and Safety Code.

§ 94547. Surplus Reductions and Surplus Trading

(a) The Executive Officer shall issue Executive Orders (Surplus Reduction Certificates) which establish and quantify, to the nearest pound of VOC reduced, any Surplus Reductions achieved by a responsible ACP party operating under an ACP. The Surplus Reductions can be bought from, sold to, or transferred to a responsible ACP party operating under an ACP, as provided in subsection (b) of this section. All Surplus Reductions shall be calculated by the Executive Officer at the end of each compliance period within the time specified in the approved ACP. Surplus Reduction Certificates shall not constitute instruments, securities, or any other form of property.

(b) The issuance, use, and trading of all Surplus Reductions shall be subject to the following provisions:

(1) For the purposes of this article, VOC reductions from sources of VOCs other than consumer products subject to the VOC standards specified in section 94509 ~~or aerosol coating products subject to the VOC standards specified in section 94522~~ may not be used to generate Surplus Reductions;

(2) Surplus Reductions are valid only when generated by a responsible ACP party, and only while that responsible ACP party is operating under an approved ACP;

(3) Surplus Reductions are valid only after the Executive Officer has issued an Executive Order pursuant to subsection (a) of this section.

(4) Any Surplus Reductions issued by the Executive Officer may be used by the responsible ACP party who generated the surplus until the reductions expire, are traded, or until the ACP is cancelled pursuant to section 94551;

(5) Surplus Reductions cannot be applied retroactively to any compliance period prior to the compliance period in which the reductions were generated;

(6) Except as provided in subsection (b)(7)(B) of this section, only small or one- product businesses selling products under an approved ACP may purchase Surplus Reductions. An increase in the size of a small business or one-product business shall have no effect on Surplus Reductions purchased by that business prior to the date of the increase.

(7) While valid, Surplus Reductions can be used only for the following purposes:

(A) to adjust either the ACP Emissions of either the responsible ACP party who generated the reductions or the responsible ACP party to which the reductions were traded, provided the Surplus Reductions are not to be used by any responsible ACP party to further lower its ACP Emissions when its ACP Emissions are equal to or less than the ACP Limit during the applicable compliance period; or

(B) to be traded for the purpose of reconciling another responsible ACP party's shortfalls, provided such reconciliation is part of the reconciliation of shortfalls plan approved by the Executive Officer pursuant to section 94543(a)(7)(J).

(8) A valid Surplus Reduction shall be in effect starting five (5) days after the date of issuance by the Executive Officer, for a continuous period equal to the number of days in the compliance period during which the Surplus Reduction was generated. The Surplus Reduction shall then expire at the end of its effective period.

(9) At least five (5) working days prior to the effective date of transfer of Surplus Reductions, both the responsible ACP party which is selling Surplus Reductions and the responsible ACP party which is buying the Surplus Reductions shall, either together or separately, notify the Executive Officer in writing of the transfer. The notification shall include all of the following:

(A) the date the transfer is to become effective;

(B) the date the Surplus Reductions being traded are due to expire;

(C) the amount (in pounds of VOCs) of Surplus Reductions that are being transferred;

(D) the total purchase price paid by the buyer for the Surplus Reductions;

(E) the contact persons, names of the companies, street and mail addresses, and phone numbers of the responsible ACP parties involved in the trading of the Surplus Reductions;

(F) a copy of the Executive Officer-issued Surplus Reductions Certificate, signed by both the seller and buyer of the certificate, showing transfer of all or a specified portion of the Surplus

Reductions. The copy shall show the amount of any remaining non-traded Surplus Reductions, if applicable, and shall show their expiration date. The copy shall indicate that both the buyer and seller of the Surplus Reductions fully understand the conditions and limitations placed upon the transfer of the Surplus Reductions and accept full responsibility for the appropriate use of such Surplus Reductions as provided in this section.

~~(10) Surplus Reduction Credits shall not be traded between an ACP for consumer products and an ACP for aerosol coating products.~~

(10) Beginning on January 1, 2024, in order to generate surplus reductions, a product with a VOC Standard under section 94509(a) that falls within the ranges in Table 94547(b)(10) 'Column A' may not exceed the corresponding percent of that standard identified in Table 94547(b)(10) 'Column B'.

Table 94547(b)(10)

Column A	Column B
20% < VOC Standard < 100%	97%
1% < VOC Standard < 20%	95%
VOC Standard < 1%	90%

(c) Limited-Use Surplus Reduction Credits for Early Reformulations of ACP Products

(1) For the purposes of this subsection (c), "early reformulation" means an ACP product which is reformulated to result in a reduction in the product's VOC Content, and which is sold, supplied, or offered for sale in California for the first time during the one-year (365 day) period immediately prior to the date on which the application for a proposed ACP is submitted to the Executive Officer. "Early reformulation" does not include any reformulated ACP products which are sold, supplied, or offered for sale in California more than one year prior to the date on which the ACP application is submitted to the Executive Officer.

(2) If requested in the application for a proposed ACP, the Executive Officer shall, upon approval of the ACP, issue Surplus Reduction Credits for early reformulation(s) of ACP product(s), provided that all of the following documentation has been provided by the responsible ACP party to the satisfaction of the Executive Officer:

(A) accurate documentation showing that the early reformulation(s) reduced the VOC content of the ACP product(s) to a level which is

below the Pre-ACP VOC content of the product(s), or below the applicable VOC standard(s) specified in sections 94509 ~~or 94522~~, whichever is the lesser of the two;

(B) accurate documentation demonstrating that the early reformulated ACP product(s) was sold in California retail outlets within the time period specified in subsection (c)(1);

(C) accurate sales records for the early reformulated ACP product(s) which meet the definition of "Enforceable Sales Records" in section 94542(a)(11), and which demonstrate that the Enforceable Sales for the ACP product(s) are at least 75.0% of the Gross California Sales for the product(s), as specified in section 94543(a)(4);

(D) accurate documentation for the early reformulated ACP product(s) which meets the requirements specified in sections 94543 (a)(3)-(4), (a)(7)(G)-(H), and (a)(8), and which identifies the specific test methods for verifying the claimed early reformulation(s) and the statistical accuracy and precision of the test methods as specified in section 94543 (a)(7)(D).

(3) Surplus Reduction Credits issued pursuant to this subsection (c) shall be calculated separately for each early reformulated ACP product by the Executive Officer according to the following equation:

$$SR = Enforceable\ Sales\ x\ \frac{([VOC\ Content]_{initial} - [VOC\ Content]_{final})}{100}$$

where,

SR = Surplus Reductions for the ACP product, expressed to the nearest pound

Enforceable Sales = the Enforceable Sales for the early reformulated ACP product, expressed to the nearest pound of ACP product,

VOC Content$_{initial}$ = the Pre-ACP VOC content of the ACP product, or the applicable VOC standard specified in sections ~~or~~ 94509 ~~or 94522~~, whichever is the lesser of the two, expressed to the nearest 0.1 pounds of VOC per 100 pounds of ACP product,

VOC Content$_{final}$ = the VOC Content of the early reformulated ACP product after the early reformulation is achieved, expressed to the nearest 0.1 pounds of VOC per 100 pounds of ACP product.

(4) The use of Surplus Reduction Credits issued pursuant to this subsection (c) shall be subject to all of the following provisions:

(A) Surplus Reduction Credits shall be used solely to reconcile the responsible ACP party's shortfalls, if any, generated during the first compliance period occurring immediately after the issuance of the Executive Order approving an ACP, and shall not be used for any other purpose;

(B) Surplus Reduction Credits shall not be transferred to, or used by, any other responsible ACP party;

(C) ~~Surplus Reduction Credits shall not be traded between an ACP for consumer products and an ACP for aerosol coating products;~~Except as provided in this subsection (c), Surplus Reduction Credits shall be subject to all requirements applicable to Surplus Reductions and Surplus Trading, as specified in subsections 94547(a) and (b).

NOTE: Authority cited: sections 39515, 39516 39600, 39601, 39607, 39701, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94548. Reconciliation of Shortfalls

(a) At the end of each compliance period, the responsible ACP party shall make an initial calculation of any shortfalls occurring in that compliance period, as specified in the Executive Order approving the ACP. Upon receipt of this information, the Executive Officer shall determine the amount of any shortfall that has occurred during the compliance period, and shall notify the responsible ACP party of this determination.

(b) The responsible ACP party shall implement the reconciliation of shortfalls plan as specified in the Executive Order approving the ACP, within 30 working days from the date of written notification of a shortfall by the Executive Officer;

(c) All shortfalls shall be completely reconciled within 90 working days from the date of written notification of a shortfall by the Executive Officer, by

~~(1)~~ implementing the reconciliation of shortfalls plan specified in the Executive Order approving the ACP.~~, or~~

~~(2) using hairspray emission reduction credits (HERCs) as specified in section 94567(c), Title 17, California Code of Regulations~~.

(d) All requirements specified in the Executive Order approving an ACP, including all applicable ACP Limits, shall remain in effect while any shortfalls are in the process of being reconciled.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94549. Notification of Modifications to an ACP by the Responsible ACP Party

(a) Modifications That Do Not Require Executive Officer Pre-Approval: The responsible ACP party shall notify the Executive Officer, in writing, of any change in an ACP product's:

(1) product name, (2) product formulation, (3) product form, (4) product function, (5) applicable product category(ies), (6) VOC Content, (7) LVP Content, (8) date- codes, or (9) recommended product usage directions, no later than 15 working days from the date such a change occurs. For each modification, the notification shall fully explain the following:

(A) the nature of the modification;

(B) the extent to which the ACP product formulation, VOC Content, LVP Content, or recommended usage directions will be changed;

(C) the extent to which the ACP Emissions and ACP Limit specified in the Executive Order will be changed for the applicable compliance period; and

(D) the effective date and corresponding date-codes for the modification.

(b) Modifications That Require Executive Officer Pre-Approval: The responsible ACP party may propose modifications to the Enforceable Sales records or reconciliation of shortfalls plan specified in the Executive Order approving the ACP. Any such proposed modifications shall be fully described in writing and forwarded to the Executive Officer. The responsible ACP party shall clearly demonstrate that the proposed modifications will meet the requirements of this article. The Executive Officer shall act on the proposed modifications using the procedure set forth in section 94544. The responsible ACP party shall meet all applicable requirements of the existing ACP until such time as any proposed modification(s) is approved in writing by the Executive Officer.

(c) Other Modifications: Except as otherwise provided in subsections (a) and (b) of this section, the responsible ACP party shall notify the Executive Officer, in writing, of any information learned of by the responsible ACP party which may alter any of the information submitted pursuant to the requirements of section 94543. The responsible ACP party shall provide such notification to the Executive Officer no later than 15 working days from the date such information is known to the responsible ACP party.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003,, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94550. Modification of an ACP by the Executive Officer

(a) If the Executive Officer determines that: (1) the Enforceable Sales for an ACP product are no longer at least 75.0% of the Gross California Sales for that product, or (2) the information submitted pursuant to the approval process set forth in section 94543 is no longer valid, or (3) the ACP Emissions are exceeding the ACP Limit specified in the Executive Order approving an ACP, then the Executive Officer shall modify the ACP as necessary to ensure that the ACP meets all requirements of this article and that the ACP Emissions will not exceed the ACP Limit. The Executive Officer shall not modify the ACP without first affording the responsible ACP party an opportunity for a public hearing in accordance with the procedures specified in Title 17, California Code of Regulations, Division 3, Chapter 1, Subchapter 1, Article 4 (commencing with section 60040), to determine if the ACP should be modified.

(b) If any applicable VOC standards specified in sections 94509 ~~or 94522~~ are modified by the Air Resources Board in a future rulemaking, the Executive Officer shall modify the ACP Limit specified in the Executive Order approving an ACP to reflect the modified VOC standards as of their effective dates.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 39607, 39701, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94551. Cancellation of an ACP

(a) An ACP shall remain in effect until:

(1) the ACP reaches the expiration date specified in the Executive Order;

(2) the ACP is modified by the responsible ACP party and approved by the Executive Officer, as provided in section 94549;

(3) the ACP is modified by the Executive Officer, as provided in section 94550;

(4) the ACP includes a product for which the VOC standard specified in sections 94509 ~~or 94522~~ is modified by the Air Resources Board in a future rulemaking, and the responsible ACP party informs the Executive Officer in writing that the ACP will terminate on the effective date(s) of the modified standard;

(5) the ACP is cancelled pursuant to subsection (b) of this section.

(b) The Executive Officer shall cancel an ACP if any of the following circumstances occur:

(1) the responsible ACP party demonstrates to the satisfaction of the Executive Officer that the continuation of the ACP will result in an extraordinary economic hardship;

(2) the responsible ACP party violates the requirements of the approved ACP, and the violation(s) results in a shortfall that is 20.0% or more of the applicable ACP Limit (i.e., the ACP Emissions exceed the ACP Limit by 20.0% or more);

(3) the responsible ACP party fails to meet the requirements of section 94548 (Reconciliation of Shortfalls) within the time periods specified in section 94548.

(4) the responsible ACP party has demonstrated a recurring pattern of violations and has consistently failed to take the necessary steps to correct those violations.

(c) The Executive Officer shall not cancel an ACP pursuant to subsection (b) of this section without first affording the responsible ACP party an opportunity for a public hearing in accordance with the procedures specified in Title 17, California Code of Regulations, Division 3, Chapter 1, Subchapter 1, Article 4 (commencing with section 60040), to determine if the ACP should be cancelled.

(d) The responsible ACP party for an ACP which is cancelled pursuant to this section and who does not have a valid ACP to immediately replace the cancelled ACP shall meet all of the following requirements:

(1) all remaining shortfalls in effect at the time of ACP cancellation shall be reconciled in accordance with the requirements of section 94548, and

(2) all ACP products subject to the ACP shall be in compliance with the applicable VOC standards in section~~s~~ 94509 ~~and 94522~~ immediately upon the effective date of ACP cancellation.

(e) Any violations incurred pursuant to section 94546 shall not be cancelled or in any way affected by the subsequent cancellation or modification of an ACP pursuant to section 94549, 94550 or 94551.

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, 41712, and 42400-42403, Health and Safety Code.

§ 94552. Treatment of Information

The information required by sections 94543 (a)(1)-(a)(2) and 94547(b)(9) is public information which may not be claimed as confidential. All other information submitted to the Executive Officer to meet the requirements of this article shall be handled in accordance with the procedures specified in Title 17, California Code of Regulations, sections 91000-91022.

NOTE: Authority cited: Sections 39515, 39516, 39600, 39601, 41511, and 41712, Health and Safety Code. Reference: Sections 39002, 39600, 40000, 41511 and 41712, Health and Safety Code.

§ 94553. Other Applicable Requirements

(a) Unless otherwise specified in the Executive Order approving an ACP, all applicable requirements specified in Title 17, California Code of Regulations, Division 3, Chapter 1, Subchapter 8.5, Article~~s 2 and 3,~~ (sections 94507-94517

~~and 94520-94528~~), shall remain in effect for all ACP products subject to an ACP.

(b) All applicable requirements specified in Title 17, California Code of Regulations, Division 3, Chapter 1, Subchapter 8.5, Article~~s~~ 2 ~~and 3~~, (sections 94507-94517 ~~and 94520-94528~~), shall remain in effect for all ACP products which are not subject to an ACP.

(c) The provisions of this article notwithstanding, the requirements of the South Coast Air Quality Management District Rule 1174 shall remain in effect for all charcoal lighter material products sold, supplied, offered for sale, or manufactured for use in the South Coast Air Quality Management District (as defined in section 40410 of the Health and Safety Code).

~~(d) The provisions of this article notwithstanding, the requirements of the Bay Area Air Quality Management District Rule 8-49 shall remain in effect for all aerosol coating products sold, supplied, offered for sale, applied, or manufactured for use in the Bay Area Air Quality Management District (as defined in section 40200 of the Health and Safety Code).~~

(~~e~~d) A responsible ACP party may transfer an ACP to another responsible ACP party, provided that all of the following conditions are met:

(1) The Executive Officer shall be notified, in writing, by both responsible ACP parties participating in the transfer of the ACP and its associated Executive Order. The written notifications shall be postmarked at least five (5) working days prior to the effective date of the transfer and shall be signed and submitted separately by both responsible parties. The written notifications shall clearly identify the contact persons, business names, mail and street addresses, and phone numbers of the responsible parties involved in the transfer.

(2) The responsible ACP party to which the ACP is being transferred shall provide a written declaration stating that the transferee shall fully comply with all requirements of the Executive Order approving the ACP and this article.

NOTE: Authority cited: sections 39515, 39516 39600, 39601, 41503.5,41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

§ 94554. Federal Enforceability

For purposes of federal enforceability of this article, the Environmental Protection Agency is not subject to approval determinations made by the

Executive Officer under this article. Within 180 days of a request from a responsible ACP party whose ACP has been approved by the Executive Officer, an ACP meeting the requirements of the Clean Air Act shall be submitted by the Executive Officer to the Environmental Protection Agency for inclusion in the applicable implementation plan approved or promulgated by the Environmental Protection Agency pursuant to section 110 of the Clean Air Act, 42 U.S.C., section 7410.

Prior to submitting an ACP as a revision to the applicable implementation plan, the Executive Officer shall hold a public hearing on the proposed revision. Notice of the time and place of the hearing shall be sent to the applicant by certified mail not less than 30 days prior to the hearing. Notice of the hearing shall also be submitted for publication in the California Regulatory Notice Register and sent to the Environmental Protection Agency, every person who requests such notice, and to any person or group of persons whom the Executive Officer believes may be interested in the application. Within 30 days of the hearing the Executive Officer shall notify the applicant of the decision in writing as provided in section 94543(b). The decision may approve, disapprove, or modify an ACP previously granted pursuant to section 94543.

NOTE: Authority cited: Sections 39515, 39516, 39600, 39601, 39602 and 41712, Health and Safety
Code. Reference: Sections 39002, 39600, 40000 and 41712, Health and Safety Code.

§ 94555. Federal Clean Air Act Requirements

(a) Unless otherwise determined by the U.S. Environmental Protection Agency, products sold, supplied, offered for sale, or manufactured for use in California under the requirements of an ACP are not subject to the requirements of Title V of the Federal Clean Air Act (42 U.S.C. sections 7661-7661f).

(b) Nothing in this article shall be construed to modify or in any way affect any requirements of the federal Clean Air Act, including but not limited to Title V of the federal Clean Air Act, which are applicable to the construction or operation of the responsible ACP party's manufacturing facility or to any other activities of the responsible ACP party.

NOTE: Authority cited: Sections 39515, 39516, 39600, 39601, 39602, and 41712, Health and Safety
Code. Reference: Sections 39002, 39600, 40000, and 41712, Health and Safety Code

Proposed Amendments to the Tables of Maximum Incremental Reactivity (MIR) Values

Final Regulation Order

State of California
Air Resources Board

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Final Regulation Order

Proposed Amendments to the
Tables of Maximum Incremental Reactivity (MIR) Values

Note: Amendments are shown in underline to indicate additions and ~~strikeout~~ to indicate deletions from the existing regulatory text. The symbol "* * * *" means that intervening text not proposed for amendment is not shown. [Bracketed underline text] is placeholder text for the approval date for these proposed amendments.

SUBCHAPTER 8.6 MAXIMUM INCREMENTAL REACTIVITY

Amend title 17, California Code of Regulations, section 94700 to read as follows:

Article 1. Tables of Maximum Incremental Reactivity (MIR) Values

§ 94700. MIR Values for Compounds.

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
*****			
815	ethyl lactate	2.71	2.48
816	diethyl carbonate***	0.71	0.71
81~~6~~7	methyl isopropyl carbonate	0.69	0.62
81~~7~~8	1-methoxy-2-propyl acetate	1.71	1.70
81~~8~~9	2-ethoxyethyl acetate	1.90	1.84
8~~19~~20	2-methyoxy-1-propyl acetate	1.12	1.12
82~~0~~1	methoxypropanol acetate	1.97	1.86
82~~1~~2	dimethyl succinate	0.23	0.23
82~~2~~3	ethylene glycol diacetate	0.72	0.66
82~~3~~4	1,2-propylene glycol diacetate	0.94	0.61
82~~4~~5	diisopropyl carbonate	1.04	0.98
82~~5~~6	dimethyl glutarate	0.51	0.42
82~~6~~7	2-butoxyethyl acetate	1.67	1.62
82~~7~~8	dimethyl adipate	1.95	1.80
82~~8~~9	2-(2-ethoxyethoxy) ethyl acetate	1.50	1.48
8~~29~~30	dipropylene glycol n-propyl ether isomer #1	2.13	2.00
83~~0~~1	dipropylene glycol methyl ether acetate isomer # 1	1.41	1.38
83~~1~~2	dipropylene glycol methyl ether acetate isomer # 2	1.58	1.52
83~~2~~3	dipropylene glycol methyl ether acetate isomers	1.49	1.45
83~~3~~4	glyceryl triacetate	0.57	0.55
83~~4~~5	2-(2-butoxyethoxy) ethyl acetate	1.38	1.38
83~~5~~6	substituted C7 ester (C12)	0.92	0.81
83~~6~~7	1-hydroxy-2,2,4-trimethylpentyl-3-isobutyrate	0.92	0.89

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
8378	3-hydroxy-2,2,4-trimethylpentyl-1-isobutyrate	0.88	0.77
8389	2,2,4-trimethyl-1,3-pentanediol monoisobutyrate and isomers (texanol ®)	0.89	0.81
83940	substituted C9 ester (C12)	0.89	0.81
8401	dimethyl sebacate	0.48	0.43
8412	diisopropyl adipate	1.42	1.28
	Glycols, Ethers, and Glycol Ethers		
8423	dimethyl ether	0.93	0.81
8434	ethylene glycol	3.36	3.13
8445	propylene glycol	2.75	2.58
8456	dimethoxy methane	1.04	0.94
8467	glycerol	3.27	3.15
8478	1,3-butanediol*	3.21	3.36
8489	1,2-butanediol	2.21	2.52
84950	1,4-butanediol	3.22	2.72
8501	2,3-butanediol*	4.23	4.38
8512	pentaerythritol	2.42	2.17
8523	1,2-dihydroxyhexane	2.75	2.55
8534	2-methyl-2,4-pentanediol	1.04	1.45
8545	2-ethyl-1,3-hexanediol	2.62	2.05
8556	trimethylene oxide	5.22	4.56
8567	1,3-dioxolane	5.47	4.96
8578	2-methoxy ethanol	2.98	2.93
8589	tetrahydrofuran	4.95	4.31
85960	diethyl ether	4.01	3.76
8601	1,4-dioxane	2.71	2.62
8612	1-methoxy-2-propanol	2.62	2.44
8623	2-ethoxy-ethanol	3.78	3.71
8634	2-methoxy-1-propanol	3.01	3.01
8645	3-methoxy-1-propanol	4.01	3.84
8656	diethylene glycol	3.55	3.35
8667	α-methyl tetrahydrofuran	4.62	3.97
8678	tetrahydropyran	3.81	3.22
8689	ethyl isopropyl ether	3.86	3.74
86970	methyl n-butyl ether	3.66	3.15
8701	methyl t-butyl ether	0.78	0.73
8712	tetrahydro-2-furanmethanol; tetrahydrofurfuryl alcohol	3.54	3.31
8723	2,2-dimethoxy-propane	0.52	0.48
8734	1-ethoxy-2-propanol	3.25	3.09
8745	2-propoxy-ethanol	3.52	3.30
8756	3-ethoxy-1-propanol	4.24	4.09

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
87~~6~~7	3-methoxy-1-butanol	0.97	3.87
87~~7~~8	2-(2-methoxyethoxy) ethanol	2.90	2.66
87~~8~~9	di-n-propyl ether	3.24	3.08
~~879~~80	ethyl n-butyl ether	3.86	3.48
88~~0~~1	ethyl tert-butyl ether	2.11	2.01
88~~1~~2	methyl tert-amyl ether; TAME	2.14	1.69
88~~2~~3	diisopropyl ether	3.56	3.52
88~~3~~4	ethylene glycol diethyl ether; 1,2-diethoxyethane	2.84	2.95
88~~4~~5	acetal (1,1-diethoxyethane)	3.68	3.58
88~~5~~6	1-propoxy-2-propanol; propylene glycol n-propyl ether	2.86	2.68
88~~6~~7	2-butoxy-ethanol	2.90	2.90
88~~7~~8	3-methoxy-3-methyl-butanol	1.74	2.88
88~~8~~9	n-propoxy-propanol	3.84	3.77
8~~89~~0	2-(2-ethoxyethoxy) ethanol	3.19	3.26
89~~0~~1	dipropylene glycol isomer (1-[2-hydroxypropyl]-2-propanol)	2.48	2.31
89~~1~~2	triethylene glycol	3.41	3.25
89~~2~~3	4,4-diethyl-3-oxahexane; tert-amyl ethyl ether; TAEE	2.03	1.95
89~~3~~4	1-tert-butoxy-2-propanol	1.71	1.61
89~~4~~5	2-tert-butoxy-1-propanol	1.81	1.81
89~~5~~6	n-butoxy-2-propanol; propylene glycol n-butyl ether	2.70	2.72
89~~6~~7	2-(2-propoxyethoxy) ethanol	3.00	2.85
89~~7~~8	dipropylene glycol methyl ether; 1-methoxy-2-(2-hydroxypropoxy)-propane	2.21	1.98
89~~8~~9	dipropylene glycol methyl ether; 2-(2-methoxypropoxy)-1-propanol	2.70	2.58
~~8~~900	2-[2-(2-methoxyethoxy) ethoxy] ethanol	2.62	2.58
90~~0~~1	2-butyl tetrahydrofuran	2.53	2.13
90~~1~~2	di-isobutyl ether	1.29	1.20
90~~2~~3	di-n-butyl ether	3.17	2.84
90~~3~~4	2-n-hexyloxyethanol	2.45	2.09
90~~4~~5	2,2,4-trimethyl-1,3-pentanediol	1.74	1.54
90~~5~~6	2-methoxy-1-(2-methoxy-1-methylethoxy)-propane; dipropylene glycol dimethyl ether	2.09	2.02
90~~6~~7	2-(2-butoxyethoxy)-ethanol	2.87	2.39
90~~7~~8	dipropylene glycol ethyl ether	2.75	2.72
90~~8~~9	2-[2-(2-ethoxyethoxy) ethoxy] ethanol	2.66	2.46
~~909~~10	tetraethylene glycol	2.84	2.51
91~~0~~1	2-(2-ethylhexyloxy) ethanol	1.71	1.55
91~~1~~2	1-(butoxyethoxy)-2-propanol	2.08	1.93
91~~2~~3	2-[2-(2-propoxyethoxy) ethoxy] ethanol	2.46	2.17

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
9134	tripropylene glycol*	2.07	2.18
9145	2,5,8,11-tetraoxatridecan-13-ol	2.15	1.97
9156	di-n-pentyl ether	2.64	2.15
9167	2-(2-hexyloxyethoxy) ethanol	2.03	1.84
9178	glycol ether DPnB; dipropylene glycol n-butyl ether; 1-(2-butoxy-1-methylethoxy)-2-propanol)	1.96	1.83
9189	2-[2-(2-butoxyethoxy) ethoxy] ethanol	2.24	1.96
91920	tripropylene glycol monomethyl ether	1.90	1.92
9201	diethylene glycol mono-(2-ethylhexyl) ether*	1.46	1.56
9212	tripropylene glycol n-butyl ether*	1.55	1.64
	Ketones		
9223	acetone	0.43	0.36
9234	cyclobutanone	0.68	0.62
9245	methyl ethyl ketone	1.49	1.48
9256	cyclopentanone	1.43	1.15
9267	C5 cyclic ketones	1.43	1.15
9278	2-pentanone	3.07	2.81
9289	3-pentanone	1.45	1.24
92930	C5 ketones	3.07	2.81
9301	methyl isopropyl ketone	1.64	1.65
9312	2,4-pentanedione	1.02	1.01
9323	cyclohexanone	1.61	1.35
9334	C6 cyclic ketones	1.61	1.35
9345	4-methyl-2-pentanone; methyl isobutyl ketone	4.31	3.88
9356	methyl n-butyl ketone	3.55	3.14
9367	methyl tert-butyl ketone	0.78	0.65
9378	C6 ketones	3.55	3.14
9389	C7 cyclic ketones	1.41	1.18
93940	2-heptanone	2.80	2.36
9401	2-methyl-3-hexanone	1.79	1.53
9412	di-isopropyl ketone	1.63	1.31
9423	C7 ketones	2.80	2.36
9434	5-methyl-2-hexanone	2.10	2.41
9445	3-methyl-2-hexanone	2.81	2.55
9456	C8 cyclic ketones	1.25	1.05
9467	2-octanone	1.66	1.40
9478	C8 ketones	1.66	1.40
9489	C9 cyclic ketones	1.13	0.94
94950	2-propyl cyclohexanone	1.71	1.54
9501	4-propyl cyclohexanone	2.08	1.85
9512	2-nonanone	1.30	1.08
9523	di-isobutyl ketone; 2,6-dimethyl-4-heptanone	2.94	2.68

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
9534	C9 ketones	1.30	1.08
9545	C10 cyclic ketones	1.02	0.86
9556	2-decanone	1.06	0.90
9567	C10 ketones	1.06	0.90
9578	2,6,8-trimethyl-4-nonanone; isobuthyl heptyl ketone	1.86	1.66
9589	biacetyl; diacetyl; butanedione	20.7	20.0
95960	methylvinyl ketone	8.73	9.65
9601	mesityl oxide; 2-methyl-2-penten-4-one	17.3	6.51
9612	isophorone; 3,5,5-trimethyl-2-cyclohexenone	10.5	4.63
9623	1-nonene-4-one	3.39	3.14
9634	hydroxy acetone	3.08	3.23
9645	dihydroxy acetone	4.02	3.99
9656	methoxy-acetone	2.14	2.03
9667	diacetone alcohol	0.68	0.60
	Phenols		
9678	phenol	1.82	2.76
9689	C7 alkyl phenols	2.34	2.40
96970	m-cresol	2.34	2.40
9701	p-cresol	2.34	2.40
9712	o-cresol	2.34	2.40
9723	4-vinyl phenol	1.43	1.50
9734	2,4-dimethyl phenol*	2.07	2.12
9745	2,5-dimethyl phenol*	2.07	2.12
9756	3,4-dimethyl phenol*	2.07	2.12
9767	2,3-dimethyl phenol*	2.07	2.12
9778	2,6-dimethyl phenol*	2.07	2.12
9789	C8 alkyl phenols	2.07	2.12
97980	2,3,5-trimethyl phenol*	1.86	1.90
9801	2,3,6-trimethyl phenol*	1.86	1.90
9812	C9 alkyl phenols	1.86	1.90
9823	C10 alkyl phenols	1.68	1.73
9834	C11 alkyl phenols	1.54	1.58
9845	C12 alkyl phenols	1.42	1.46
9856	2-phenoxyethanol; ethylene glycol phenyl ether	3.61	4.49
9867	1-phenoxy-2-propanol	1.73	1.60
9878	2,6-di-tert-butyl-p-cresol*	1.15	1.18
	Other Oxygenated Organics		
9889	glycolaldehyde*	4.96	5.10
9890	lumped C5+ unsaturated carbonyl species*	6.18	6.38
9901	benzyl alcohol*	4.98	5.11
9912	methoxybenzene; anisole*	6.49	6.66
9923	β-phenethyl alcohol; 2-phenyl ethyl alcohol*	4.41	4.53

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
9934	phthalic anhydride*	2.50	2.58
9945	methylparaben; 4-hydroxybenzoic acid, methyl ester*	1.66	1.71
9956	cinnamic aldehyde*	4.68	4.84
9967	cinnamic alcohol*	0.84	0.89
9978	anethol; p-propenyl-anisole*	0.76	0.80
9989	camphor*	0.45	0.49
9991000	citronellol; 3,7-dimethyl-6-octen-1-ol*	5.63	5.79
10001	hydroxycitronella*; hydroxycitronellal	2.50	2.61
10012	linalool*	5.28	5.43
10023	1,2-diacetyl benzene*	2.17	2.25
10034	geraniol*	4.97	5.12
10045	propylparaben*; 4-hydroxybenzoic acid, propyl ester	1.40	1.44
10056	diethyl phthalate*	1.56	1.62
10067	3,6,9,12-tetraoxa-hexadecan-1-ol	1.90	1.72
10078	triethyl citrate*	0.66	0.70
10089	amyl cinnamal*	3.06	3.16
10091010	hexyl cinnamal*	2.86	2.96
10101	2-ethyl-hexyl benzoate*	0.93	0.98
10112	dibutyl phthalate*	1.20	1.25
10123	2,2,4-trimethyl-1,3-pentanediol diisobutyrate*	0.34	0.38
10134	methyl hexadecanoate; methyl palmitate*	0.40	0.44
10145	methyl cis-9-heptadecenoate*	1.56	1.62
10156	methyl heptadecanoate; methyl margarate*	0.38	0.42
10167	methyl linolenate; methyl cis,cis,cis-9,12,15-octadecatrienoate*	1.77	2.32
10178	methyl linoelate; methyl cis,cis-9,12-octadecadienoate*	1.48	1.84
10189	methyl cis-9-octadecenoate; methyl oleate*	1.48	1.54
10191020	methyl octadecanoate; methyl stearate*	0.36	0.40
	Other Organic Compounds		
10201	methylamine*	7.29	7.70
10212	methyl chloride	0.03	0.04
10223	methyl nitrite*	10.50	10.84
10234	nitromethane	7.86	0.07
10245	carbon disulfide*	0.23	0.25
10256	dichloromethane	0.07	0.04
10267	methyl bromide	0.02	0.02
10278	chloroform	0.03	0.02
10289	methyl iodide*	0.00	0.00
10293030	carbon tetrachloride	0.00	0.00
10301	chloropicrin; trichloro-nitro-methane*	1.80	1.85
10312	methylene bromide	0.00	0.00

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
10323	acetylene	1.25	0.95
10334	dimethyl amine	9.37	3.17
10345	ethyl amine	7.80	5.78
10356	ethanolamine	5.97	6.81
10367	vinyl chloride	2.92	2.83
10378	ethyl chloride	0.25	0.29
10389	1,1-difluoroethane; HFC-152a	0.00	0.02
1039340	methyl isothiocyanate*; MITC	0.31	0.32
10401	nitroethane	12.79	0.06
10412	dimethyl sulfoxide; DMSO	6.90	6.68
10423	chloroacetaldehyde*	12.00	12.30
10434	1,1-dichloroethene*	1.69	1.79
10445	trans-1,2-dichloroethene	0.81	1.70
10456	cis-1,2-dichloroethene*	1.65	1.70
10467	1,1-dichloroethane	0.10	0.07
10478	1,2-dichloroethane	0.10	0.21
10489	1,1,1,2-tetrafluoroethane; HFC-134a	0.00	0.00
1049450	ethyl bromide	0.11	0.13
10501	trichloroethylene; TCE	0.60	0.64
10512	1,1,1-trichloroethane	0.00	0.01
10523	1,1,2-trichloroethane	0.06	0.09
10534	perchloroethylene; perc	0.04	0.03
10545	1,2-dibromoethane	0.05	0.10
10556	methyl acetylene	6.45	6.72
10567	acrylonitrile*	2.16	2.24
10578	trimethyl amine	7.06	6.32
10589	isopropyl amine*	6.93	7.23
1059560	n-methyl acetamide**	19.70	20.19
10601	1-amino-2-propanol	13.42	5.42
10612	3-chloropropene*	11.98	12.22
10623	1-nitropropane	16.16	0.22
10634	2-nitropropane	16.16	0.11
10645	chloroacetone*	9.22	9.41
10656	trans-1,3-dichloropropene*	4.92	5.03
10667	cis-1,3-dichloropropene*	3.61	3.70
10678	1,3-dichloropropene mixture*	4.19	4.29
10689	1,2-dichloropropane*	0.28	0.29
1069770	trans-1,3,3,3-tetrafluoropropene*; trans-HFO-1234ze	0.09	0.10
10701	2,3,3,3-tetrafluoropropene*; HFO-1234yf	0.27	0.28
1072	1-chloro-3,3,3-trifluoropropene; HFO-1233zd***	0.04	0.04
10713	n-propyl bromide	0.35	0.42
10724	1,1,1,3,3-pentafluoropropane*; HFC-245fa	0.00	0.00

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
10735	3,3-dichloro-1,1,1,2,2-pentafluoro-propane; HCFC-225ca*	0.00	0.00
10746	1,3-dichloro-1,1,2,2,3-pentafluoro-propane; HCFC-225cb*	0.00	0.00
10757	1,3-butadiyne*	5.53	5.76
10768	1-buten-3-yne; vinyl acetylene*	10.15	10.48
10779	2-butyne	16.33	16.32
10780	ethyl acetylene	6.20	6.11
10798 1	tert-butyl amine*	0.00	0.00
10802	morpholine	15.43	1.98
10813	ethyl methyl ketone oxime; methyl ethyl ketoxime*	22.04	1.58
10824	dimethylaminoethanol; DMAE	4.76	5.62
10835	2-amino-1-butanol*	4.78	4.98
10846	2-amino-2-methyl-1-propanol; AMP	15.08	0.25
10857	1-chlorobutane*	1.04	1.10
10868	diethylenetriamine**	13.03	15.53
10879	diethanol-amine	4.05	2.47
10889 0	2-(chloro-methyl)-3-chloro-propene	1.13	7.00
10891	n-butyl bromide	0.60	0.82
10902	1,1,1,3,3-pentafluorobutane; HFC-365mfc*	0.00	0.00
10913	n-methyl-2-pyrrolidone	2.56	2.41
10924	2-amino-2-ethyl-1,3-propanediol*	0.00	0.78
10935	hydroxyethylethylene urea**	14.75	11.22
10946	methoxy-perfluoro-n-butane*; methyl- nonafluoro-butyl ether; HFE-7100 isomer	0.00	0.00
10957	methoxy-perfluoro-isobutene*; methyl-nonafluoro-isobutyl ether; HFE-7100 isomer	0.00	0.00
10968	1,1,1,2,2,3,4,5,5,5-decafluoro-pentane; HFC-43-10mee*	0.00	0.00
10979	triethyl amine	16.60	3.84
1098 100	triethylene diamine*	3.31	3.46
1099 101	monochlorobenzene	0.36	0.32
11002	nitrobenzene	0.07	0.06
11013	p-dichlorobenzene	0.20	0.18
11024	o-dichlorobenzene*	0.17	0.18
11035	triethanolamine*	2.76	4.21
11046	hexamethyl-disiloxane*	0.00	0.00
11057	hydroxymethyl-disiloxane*	0.00	0.00
11068	hexafluoro-benzene*	0.05	0.05
11079	ethoxy-perfluoro-n-butane*; ethyl nonafluoro-butyl ether; HFE-7200 isomer	0.01	0.01

	Organic Compound	MIR Value (July 18, 2001)	New MIR Value October 2, 2010
11~~08~~10	ethoxy-perfluoro-isobutane*; ethyl nonafluoro-isobutyl ether; HFE-7200 isomer	0.01	0.01
11~~09~~11	perfluoro-n-hexane*	0.00	0.00
111~~0~~2	2-chlorotoluene*	2.82	2.92
111~~1~~3	m-nitrotoluene*	0.48	0.50
111~~2~~4	benzotrifluoride	0.26	0.29
111~~3~~5	p-trifluoromethyl-chloro-benzene	0.11	0.13
1114~~6~~	p-toluene isocyanate	0.93	1.06
111~~5~~7	3-(chloromethyl)-heptane*	0.88	0.95
111~~6~~8	cyclosiloxane D4; octamethylcyclotetrasiloxane*	0.00	0.00
1117~~7~~9	cumene hydroperoxide; 1-methyl-1-phenylethylhydroperoxide**	12.61	9.08
11~~18~~20	2,4-toluene diisocyanate*	0.00	0.00
11~~19~~21	2,6-toluene diisocyanate*	0.00	0.00
112~~0~~2	toluene diisocyanate (mixed isomers)*	0.00	0.00
112~~1~~3	molinate; S-ethyl hexahydro-1H-azepine-1-carbothioate*	1.43	1.51
112~~2~~4	EPTC; S-ethyl dipropyl-thiocarbamate*	1.58	1.67
112~~3~~5	triisopropanolamine*	2.60	2.70
1124~~6~~	dexpanthenol; pantothenylol**	9.35	6.15
112~~5~~7	pebulate; S-propyl butylethylthio-carbamate*	1.58	1.67
112~~6~~8	cyclosiloxane D5; decamethyl-cyclopentasiloxane*	0.00	0.00
1127~~7~~9	thiobencarb; S-[4-chlorobenzyl] N,N-diethylthiolcarbamate*	0.65	0.68
11~~28~~30	methylene diphenylene diisocyanate	0.79	0.89
11~~29~~31	lauryl pyrrolidone*	0.89	0.94
	Complex Mixtures		
113~~0~~2	base ROG mixture	3.71	3.60
1133	Alkane Mixed - Minimally 90% C13 and higher carbon number***	0.67	0.60
113~~1~~4	kerosene*	1.46	1.62
113~~2~~5	oxo-tridecyl acetate	0.67	0.55
113~~3~~6	oxo-dodecyl acetate	0.72	0.59
11347	oxo-decyl acetate	0.83	0.70
113~~5~~8	oxo-nonyl acetate	0.85	0.72
113~~6~~9	oxo-octyl acetate	0.96	0.81
11~~37~~40	oxo-heptyl acetate	0.97	0.83
11~~38~~41	oxo-hexyl acetate	1.03	0.86
11~~39~~42	turpentine*	4.12	4.28
114~~0~~3	soy methyl esters; alkyl C16-C18 methyl esters*	1.52	1.58

* This reactive organic compound was added to the Table of MIR Values on October 2, 2010, and may be used in aerosol coating products after October 2, 2010, as specified in section 94522(h~~i~~)(3)(B), title 17, California Code of Regulations

** ULMIR (as defined in section 94521(a)(81), title 17, California Code of Regulations.)

*** This reactive organic compound was added to the Table of MIR Values on August 1, 2022, and may be used in aerosol coating products after August 1, 2022, as specified in section 94522(h)(3)(B), title 17, California Code of Regulations

NOTE: Authority cited: sections 39515, 39516, 39600, 39601, 41503.5, 41511, and 41712, Health and Safety Code. Reference: sections 39000, 39002, 39003, 39600, 39602, 40000, 41504, 41511, 41700, and 41712, Health and Safety Code.

[PROPOSED AMENDMENTS TO] METHOD 310

Determination of Volatile Organic Compounds (VOC) in Consumer Products and Reactive Organic Compounds (ROC) in Aerosol Coating Products

(Including Appendix A)

Adopted: September 25, 1997
Amended: September 3, 1999
Amended: July 18, 2001
Amended: May 5, 2005
Amended: August 6, 2010
Amended: September 29, 2011
Amended: August 1, 2014
Amended: May 25, 2018
Amended: August 1, 2022

[Note: Amendments are shown in underline to indicate additions and ~~strikeout~~ to indicate deletions from the existing regulatory text.]

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METHOD 310

DETERMINATION OF VOLATILE ORGANIC COMPOUNDS (VOC) IN CONSUMER PRODUCTS AND REACTIVE ORGANIC COMPOUNDS (ROC) IN AEROSOL COATING PRODUCTS

(Including Appendix A)

1 APPLICABILITY

2.1. ~~This method~~CARB Method 310 (Method 310) applies to the determination of ~~the percent by weight of~~ each of the following:

(1) V~~v~~olatile organic compound~~s~~ (VOC) content of a~~in~~ consumer product~~s~~, ~~antiperspirant and deodorant products, as those terms are defined in~~under Title 17, California Code of Regulations (CCR), ~~Division 3, Chapter 1, Subchapter 8.5~~(Consumer Products Regulations) ~~(Consumer Products)~~, ~~commencing with~~ Article 1, sections 94500-94506.5 and Article 2, sections 9450~~8~~7-94517~~, and~~;

(2) ~~low vapor pressure volatile organic compounds~~ (LVP-VOC~~)~~ as that term is defined in section 94508~~(a).~~;

(3) Volatile components of a product that do not meet the definition of a VOC or are exempted, under sections 94501, 94503, 94508, or 94510;

(4) Specific components that are prohibited under sections 94509, 94522; and

(5) Reactive organic compound (ROC) content, under Article 2, section 94509; and Article 3, sections 94520-94528, for the purposes of calculating product-weighted maximum incremental reactivity (PWMIR).

~~1.2 Method 310 applies to the determination of product weighted maximum incremental reactivity (PWMIR) of aerosol coating products, as that term is defined in Title 17, CCR, Consumer Products section 94521.~~

~~1.3 Method 310 determines the total volatile material in a product and the presence of any compounds prohibited by CARB regulations ("prohibited compounds"). Components of the product that do not meet the definition of a VOC or are exempted by CARB regulations for a specific product category ("exempt compounds") are subtracted from the total volatile material to determine the final VOC content for the product. Method 310 is also used to determine the percent by weight of the reactive organic compounds (ROC).~~

~~1.4~~1.2 Method 310 does not apply to the determination of the composition or concentration of fragrance components in products.

~~1.5~~1.3 Definitions:~~The term "Executive Officer" as used in this document means the Executive Officer of the Air Resources Board or his or her authorized representative.~~

1.3.1 Chemical "compound" means a molecule of definite chemical formula and isomeric structure.

1.3.2 Chemical "mixture" means a substance comprised of two or more chemical compounds.

1.3.3 "Content" means the weight of a compound or a mixture in a product expressed as a percentage of the product weight (exclusive of the container or packaging).

2 REFERENCE<u>S</u> ~~METHODS~~

2.1. Reference Methods

Method 310 incorporates by reference the following ASTM International (ASTM), National Institute for Occupational Safety and Health (NIOSH), and United States Environmental Protection Agency (US EPA) analytical test methods:

2.1.1 ASTM D86-01, Standard Test Method for Distillation of Petroleum Products at Atmospheric Pressure (August 10, 2001).

2.1.2 ASTM D523-08, Standard Test Method for Specular Gloss (June 1, 2008).

2.1.3 ASTM D850-00, Standard Test Method for Distillation of Industrial Aromatic Hydrocarbons and Related Materials (December 10, 2000).

2.1.4 ASTM D859-00, Standard Test Method for Silica in Water (June 10, 2000).

2.1.5 ASTM D1078-01, Standard Test Method for Distillation Range of Volatile Organic Liquids (June 10, 2001).

2.1.6 ASTM D1426-98, Standard Test Methods for Ammonia Nitrogen in Water (December 10, 1998).

2.1.7 ASTM D1613-06, Standard Test Method for Acidity in Volatile Solvents and Chemical Intermediates Used in Paint, Varnish, Lacquer, and Related Products (April 1, 2006).

2.1.8 ASTM D2369-01, Standard Test Method for Volatile Content of Coatings (January 10, 2001).

2.1.9 ASTM D2879-97, Standard Test Method for Vapor Pressure-Temperature Relationship and Initial Decomposition Temperature of Liquids by Isoteniscope (April 10, 1997).

2.1.10 ASTM D2887-01, Standard Test Method for Boiling Range Distribution of Petroleum Fractions by Gas Chromatography (May 10, 2001).

2.1.11 ASTM D3063-94, Standard Test Method for Pressure in Glass Aerosol Bottles (November 15, 1994), with the modifications found in Appendix A to this Method 310.

2.1.12 ASTM D3064-97, Standard Terminology Relating to Aerosol Products (September 10, 1997).

2.1.13 ASTM D3074-94, Standard Test Methods for Pressure in Metal Aerosol Containers (November 15, 1994), with the modifications found in Appendix A to this Method 310.

2.1.14 ASTM D3257-06, Standard Test Methods for Aromatics in Mineral Spirits by Gas Chromatography (April 1, 2006).

2.1.15 ASTM D3606-07, Standard Test Method for Determination of Benzene and Toluene in Finished Motor and Aviation Gasoline by Gas Chromatography (November 1, 2007).

2.1.16 ASTM D3792-99, Standard Test Method for Water Content of Coatings by Direct Injection Into a Gas Chromatograph (May 10, 1999).

2.1.17 ASTM D4017-96a, Standard Test Method for Water in Paints and Paint Materials by the Karl Fisher Method (July 10, 1996).

2.1.18 ASTM D4057-12, Standard Practice for Manual Sampling of Petroleum and Petroleum Products (December 1, 2012).

2.1.19 ASTM D4177-16e1, Standard Practice for Automotive Sampling of Petroleum and Petroleum Products (October 1, 2016).

2.1.20 ASTM D4626-95(2015), Standard Practice for Calculation of Gas Chromatographic Response Factors (April 1, 2015).

2.1.21 ASTM D5381-93(2014), Standard Guide for X-Ray Fluorescence (XRF) Spectroscopy of Pigments and Extenders (July 1, 2014).

2.1.22 ASTM D5443-14, Standard Test Method for Paraffin, Naphthene, and Aromatic Hydrocarbon Type Analysis in Petroleum Distillates Through 200°C by Multi-Dimensional Gas Chromatography (June 15, 2014).

2.1.23 ASTM D5580-15, Standard Test Method for Determination of Benzene, Toluene, Ethylbenzene, p/m-Xylene, o-Xylene, C9 and Heavier Aromatics, and Total Aromatics in Finished Gasoline by Gas Chromatography (December 1, 2015).

2.1.24 ASTM D6730-01(2016), Standard Test Method for Determination of Individual Components in Spark Ignition Engine Fuels by 100-Metre Capillary (with Precolumn) High-Resolution Gas Chromatography (April 1, 2016).

2.1.25 ASTM E203-01, Standard Test Method for Water Using Volumetric Karl Fisher Titration (October 1, 2001).

2.1.26 ASTM E1719-97, Standard Test Method for Vapor Pressure of Liquids by Ebulliometry (March 10, 1997).

2.1.27 ASTM E1782-08, Standard Test Method for Determining Vapor Pressure by Thermal Analysis (March 1, 2008).

2.1.28 NIOSH Methods 1300, Ketones I, NIOSH Manual of Analytical Methods, Fourth Edition (August 15, 1994).

2.1.29 NIOSH Methods 1400, Alcohols I, NIOSH Manual of Analytical Methods, Fourth Edition (August 15, 1994).

2.1.30 NIOSH: Methods 1401, Alcohols II, NIOSH Manual of Analytical Methods, Fourth Edition (August 15, 1994).

2.1.31 NIOSH: Methods 1402, Alcohols III, NIOSH Manual of Analytical Methods, Fourth Edition (August 15, 1994).

2.1.32 NIOSH: Methods 1403, Alcohols IV, NIOSH Manual of Analytical Methods, Fourth Edition (March 15, 2003).

2.1.33 US EPA Method 18, Measurement of Gaseous Organic Compound Emissions by Gas Chromatography, Title 40 CFR Part 60, Appendix A (July 1, 1996).

2.1.34 US EPA Method 24, Determination of Volatile Matter Content, Water Content, Density, Volume Solids, and Weight Solids of Surface Coatings, Title 40 Code of Federal Regulations (CFR) Part 60, Appendix A (July 1, 1996).

2.1.35 US EPA Method 24A, Determination of Volatile Matter Content and Density of Printing Inks and Related Coatings, Title 40 CFR Part 60, Appendix A (July 1, 1994).

2.1.36 US EPA Method 300.7, Dissolved Sodium, Ammonium, Potassium, Magnesium, and Calcium in Wet Deposition by Chemically Suppressed Ion Chromatography, EPA Report # 600/4-86-024 (March 1, 1986).

2.1.37 US EPA Method 625, Base/Neutrals and Acids, Title 40 CFR 136 Appendix A, Method for Organic Chemical Analysis of Municipal and Industrial Wastewater (July 1, 2007).

2.1.38 US EPA Method 8240B, Revision 2, September 1994, Final Update IIA to the Third Edition of the Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, Volatile Organic Compounds by Gas Chromatography/Mass Spectrometry (GC/MS), EPA publication SW-846.

2.1.39 US EPA Method 8260B, Revision 2, December 1996, Final Update III to the Third Edition of the Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, Volatile Organic Compounds by Gas Chromatography/Mass Spectrometry (GC/MS), EPA publication SW-846.

2.1.40 US EPA Method 8270D, Revision 4, January 1998, Final Update IV to the Third Edition of the Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, Semivolatile Organic Compounds by Gas Chromatography / Mass Spectroscopy (GC/MS), EPA publication SW-846.

~~2.1 ASTM D2369-01, Standard Test Method for Volatile Content of Coatings (January 10, 2001).~~

~~2.2 ASTM D1426-98, Standard Test Methods for Ammonia Nitrogen in Water (December 10, 1998).~~

~~2.3 ASTM D4017-96a, Standard Test Method for Water in Paints and Paint Materials by the Karl Fisher Method (July 10, 1996).~~

~~2.4 ASTM D3792-99, Standard Test Method for Water Content of Coatings by Direct Injection Into a Gas Chromatograph (May 10, 1999).~~

~~2.5 ASTM D859-00, Standard Test Method for Silica in Water (June 10, 2000).~~

2.6 ASTM D3074-94, Standard Test Methods for Pressure in Metal Aerosol Containers (November 15, 1994), with the modifications found in Appendix A to this Method 310.

2.7 ASTM D3063-94, Standard Test Method for Pressure in Glass Aerosol Bottles (November 15, 1994), with the modifications found in Appendix A to this Method 310.

2.8 ASTM D3064-97, Standard Terminology Relating to Aerosol Products (September 10, 1997).

2.9 NIOSH Methods 1400, Alcohols I, NIOSH Manual of Analytical Methods, Fourth Edition, (August 1994).

2.10 US EPA Method 8240B, Revision 2, September 1994, Final Update IIA to the Third Edition of the Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, Volatile Organic Compounds by Gas Chromatography/Mass Spectrometry (GC/MS), EPA publication SW-846.

2.11 US EPA Method 8260B, Revision 2, December 1996, Final Update III to the Third Edition of the Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, Volatile Organic Compounds by Gas Chromatography/Mass Spectrometry (GC/MS), EPA publication SW-846.

2.12 US EPA Method 24, Determination of Volatile Matter Content, Water Content, Density, Volume Solids, and Weight Solids of Surface Coatings, Title 40 Code of Federal Regulations (CFR) Part 60, Appendix A, (July 1, 1996).

2.13 US EPA Method 24A, Determination of Volatile Matter Content and Density of Printing Inks and Related Coatings, Title 40 CFR Part 60, Appendix A, (July 1, 1994).

2.14 US EPA Method 18, Measurement of Gaseous Organic Compound Emissions by Gas Chromatography, Title 40 CFR Part 60, Appendix A, (July 1, 1996).

2.15 US EPA Method 300.7, Dissolved Sodium, Ammonium, Potassium, Magnesium, and Calcium in Wet Deposition by Chemically Suppressed Ion Chromatography, EPA Report # 600/4-86-024, (March 1, 1986).

2.16 ASTM D86-01, Standard Test Method for Distillation of Petroleum Products at Atmospheric Pressure (August 10, 2001).

2.17 ASTM D850-00, Standard Test Method for Distillation of Industrial Aromatic Hydrocarbons and Related Materials (December 10, 2000).

2.18 ASTM D1078-01, Standard Test Method for Distillation Range of Volatile Organic Liquids (June 10, 2001).

2.19 ASTM D2879-97, Standard Test Method for Vapor Pressure-Temperature Relationship and Initial Decomposition Temperature of Liquids by Isoteniscope (April 10, 1997).

2.20 ASTM D2887-01, Standard Test Method for Boiling Range Distribution of Petroleum Fractions by Gas Chromatography (May 10, 2001).

2.21 ASTM E1719-97, Standard Test Method for Vapor Pressure of Liquids by Ebulliometry (March 10, 1997).

2.22 ASTM D3257-06, Standard Test Methods for Aromatics in Mineral Spirits by Gas Chromatography (April 1, 2006).

2.23 ASTM D3606-07, Standard Test Method for Determination of Benzene and Toluene in Finished Motor and Aviation Gasoline by Gas Chromatography (November 1, 2007).

2.24 ASTM D3710-95(2004), Standard Test Method for Boiling Range Distribution of Gasoline and Gasoline Fractions by Gas Chromatography (November 1, 2004).

2.25 ASTM D5443-04, Standard Test Method for Paraffin, Naphthene, and Aromatic Hydrocarbon Type Analysis in Petroleum Distillates Through 200°C by Multi-Dimensional Gas Chromatography (November 1, 2004).

2.26 ASTM D5580-02(2007), Standard Test Method for Determination of Benzene, Toluene, Ethylbenzene, p/m Xylene, o Xylene, C9 and Heavier Aromatics, and Total Aromatics in Finished Gasoline by Gas Chromatography (November 1, 2007).

2.27 ASTM E1782-08, Standard Test Method for Determining Vapor Pressure by Thermal Analysis (March 1, 2008).

2.28 US EPA Method 602, Purgeable Aromatics, Title 40 CFR 136 Appendix A, Method for Organic Chemical Analysis of Municipal and Industrial Wastewater (July 1, 2007).

2.29 US EPA Method 625, Base/Neutrals and Acids, Title 40 CFR 136 Appendix A, Method for Organic Chemical Analysis of Municipal and Industrial Wastewater (July 1, 2007).

2.30 US EPA Method 8015B, Revision 2, December 1996, Final Update III to the Third Edition of the Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, Non-Halogenated Organics Using GC/FID, EPA publication SW-846.

2.31 US EPA Method 8020A, Revision 1, September 1994, Final Update II to the Third Edition of the Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, Aromatic Volatile Organics by Gas Chromatography, EPA publication SW-846.

~~2.32 US EPA Method 8270D, Revision 4, January 1998, Final Update IV to the Third Edition of the Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, Semivolatile Organic Compounds by Gas Chromatography / Mass Spectroscopy (GC/MS), EPA publication SW-846.~~

~~2.33 ASTM D5381-93(2009), Standard Guide for X-Ray Fluorescence (XRF) Spectroscopy of Pigments and Extenders (February 1, 2009).~~

~~2.34 ASTM D523-08, Standard Test Method for Specular Gloss (June 1, 2008).~~

~~2.35 ASTM D1613-06, Standard Test Method for Acidity in Volatile Solvents and Chemical Intermediates Used in Paint, Varnish, Lacquer, and Related Products (April 1, 2006).~~

~~2.36 ASTM D6730-01(2016), Standard Test Method for Determination of Individual Components in Spark Ignition Engine Fuels by 100-Metre Capillary (with Precolumn) High-Resolution Gas Chromatography, (April 1, 2016).~~

~~2.37 ASTM D4057-12, Standard Practice for Manual Sampling of Petroleum and Petroleum Products, (December 1, 2012).~~

~~2.38 ASTM D4177-16e1, Standard Practice for Automotive Sampling of Petroleum and Petroleum Products, (October 1, 2016).~~

~~2.39 ASTM D4626-95(2015), Standard Practice for Calculation of Gas Chromatographic Response Factors, (April 1, 2015).~~

~~2.40 ASTM E203-01, Standard Test Method for Water Using Volumetric Karl Fisher Titration, (October 1, 2001).~~

3 TESTING TO DETERMINE VOC

3.1. ~~Testing begins when the~~ The Executive Officer may select~~s~~ a product for analysis under ~~by~~ Method 310. After selection of the product, t~~T~~he Executive Officer shall~~will~~ maintain ~~sample~~ chain of custody for that product throughout the ~~selection and~~ analytical process, by ensuring that the product is kept in a secure location.[1]

3.2. Initial Testing of Aerosol Products

If the sample is an aerosol product, the aerosol propellant shall be~~is~~ separated from the non-propellant portion of the product using ASTM D3074-94 (as modified in Appendix A for metal aerosol container) or ASTM D3063-94 (as modified in Appendix A for glass aerosol container). The propellant portion is analyzed ~~for exempt or prohibited compounds by~~ using US EPA Method 18. The remaining non-propellant portion of the product shall be~~is then~~ analyzed as

[1] Alternative test methods may be used, as provided in section 8 of Method 310.

~~[1] Alternate test methods may be used, as provided in section 7.0.~~

specified in section 3.3.

3.3. Initial Testing of Non-Aerosol Products and the Non-Propellant Portion of Aerosol Products

The non-aerosol product or non-propellant portion of an aerosol product shall beis analyzed to determine the total volatile contentmaterial present in the sample, and to determine the presence of any components that are exempt, or prohibited, or volatile but do not meet the definition of a VOC in the Consumer Products Regulations compounds. This analysis shall beis conducted by performing the following tests, as applicable: [4]

3.3.1 Gravimetric analysis of samples to determine the weight percent of tTotal volatile materialcontent determination, using one or more of the following: US EPA Method 24, US EPA Method 24A, ASTM D2369-01.;

3.3.2 Determination of sample wWater content. For determination, by either using of water content either ASTM D4017-96a (including ASTM E203-01), or ASTM D3792-99 may be used, or by averaging results from both ASTM D4017-96a (including ASTM E203-01) and ASTM D3792-99procedures may be averaged and that value reported.;

3.3.3 Determination of aAmmonium content determination, using either ASTM D1426-98 or US EPA Method 300.7.;

3.3.4 Determination of kKetones and/or alcohol content determination, using one or more of the following: NIOSH Method 1300, NIOSH Method 1400, NIOSH Method 1401, NIOSH Method 1402, NIOSH Method 1403.;

3.3.5 Analysis of eExempt and/or prohibited compoundscontent determination, if present, using one or more of the following: (US EPA Method 18, US EPA Method 8240B, US EPA Method 8260B, ASTM D859-00, NIOSH Method 1400), NIOSH Method 1401, NIOSH Method 1402, NIOSH Method 1403, ASTM D5443-14, ASTM D5580-15. Effective January 1, 2015, for non- aerosol "Multi-purpose Solvent" and "Paint Thinner" products sold, supplied, offered for sale, or manufactured for sale in the South Coast Air Quality Management District, analysis of exempt and prohibited compounds shall include analysis for methyl esters with 17 or more carbon atoms, if present.;

3.3.6 If LVP-VOC determination. If LVP-VOC status is claimed or the analysis indicates the presence of an LVP-VOC component and the percent VOC is not in compliance, the Executive Officer maywill request formulation data as specified in sSection 3.4.2.;

3.3.7 For low level VOC content samples, direct determination for products with low level VOC (<5%), using one or more of the following: US EPA Method 18, US EPA Method 8240B, US EPA Method 8260B, ASTM D859-00, NIOSH

Method 1400, NIOSH Method 1401, NIOSH Method 1402, NIOSH Method 1403.; and

3.3.8 For hHydrocarbon compound content determination, using one or more of the following: US EPA Method 602, US EPA SW-846 Method 8020A, US EPA Modified Method 8015, US EPA Method 625, US EPA Method SW-846 Method 8270D, ASTM D5443-14D5443-04, ASTM D3257-06, ASTM D3710- 95, ASTM D3606-07, ASTM D5580-15D5580-02, ASTM D6730-01(2016), ASTM D4057-12, ASTM D4177-16e1, ASTM D4626-95(2015).

3.4. Initial Determination of VOC Content

If tThe Executive Officer makes awill determine the VOC content determination, they shall do so pursuant to sections 3.2 and 3.3. Only those components with concentrations equal to or greater than 0.1 percent by weight shallwill be reported.

3.4.1 Using the appropriate equationformula specified in section 4.0, the Executive Officer shallwill make an initial determination of whether the product meets the applicable VOC standards specified in the Consumer Products Regulations, under sections 94502 and 94509CARB regulations. If initial results show that the product does not meet the applicable VOC standards, the Executive Officer may perform additional testing to confirm the initial results.

3.4.2 If the results obtained under section 3.4.1 show that the product does not meet the applicable VOC standards, the Executive Officer maywill request the responsible party to supply product formulation data to confirm compliance with the applicable VOC standard. The responsible party shall supply the requested information within 25 working days of the request. Information submitted to the CARB Executive Officer may be claimed as confidential.; The Executive Officer shall handle confidentialsuch information will be handled in accordance with the confidentiality procedures specified in Regulations, Title 17, CCR, Division 3, Chapter 1, Subchapter 4 (Disclosure of Public Records), sections 91000 to 91022. Failure to respond to an Executive Officer request for this information is a violation.

3.4.3 If the information supplied by the responsible party shows that the product does not meet the applicable VOC standards, If the Executive Officer determines, based on testing, information they may receive from the responsible party, and any other applicable evidence, that the product does not comply with the applicable VOC standard,then the Executive Officer will take appropriate enforcement action.

3.4.4 If the responsible party fails to provide formulation data as specified in section 3.4.2, the initial determination of VOC content under this section 3.4 shall determine if the product is in compliance with the applicable VOC standards. This determination may be used to establish a violation of CARB regulations.

3.5. Determination of the LVP-VOC status of compounds and mixtures. This section does not apply to antiperspirants and deodorants or aerosol coating products. Effective January 1, 2015, this section also does not apply to non-aerosol "Multi-purpose Solvent" and "Paint Thinner" products sold, supplied, offered for sale, or manufactured for sale in the South Coast Air Quality Management District. There is no LVP-VOC exemption for these products.

3.5.1 Formulation data. If the vapor pressure or boiling point, or both, are~~is~~ unknown, the following ASTM methods, which are incorporated by reference herein, may be used to determine the LVP- VOC status of compounds and mixtures: ~~ASTM D86-01 (August 10, 2001), ASTM D850-00 (December 10, 2000), ASTM D1078-01 (June 10, 2001), ASTM D2879-97 (April 10, 1997), ASTM D2887-01 (May 10, 2001), and ASTM E1719-97 (March 10, 1997).~~

3.5.1.1 Testing to determine vapor pressure may be performed using one of the following ASTM methods: ASTM D2879-97 (April 10, 1997), ASTM E1719-97 (March 10, 1997), or ASTM E1782-08 (March 1, 2008).

3.5.1.2 Testing to determine boiling point may be performed using one of the following ASTM methods: ASTM D86-01 (August 10, 2001), ASTM D850-00 (December 10, 2000), ASTM D1078- 01 (June 10, 2001), or ASTM D2887-01 (May 10, 2001).

3.5.2 LVP-VOC status of "compounds" or "mixtures." The Executive Officer may~~will~~ test a sample of the LVP-VOC used in the product formulation to determine the boiling point for a compound or for a mixture. If the boiling point exceeds 216°C, the compound or mixture is an LVP-VOC. If the boiling point is less than 216°C, then the weight percent of the mixture which boils above 216°C is an LVP-VOC. The Executive Officer shall~~will~~ use the nearest 1 percent distillation cut that is greater than 216°C as determined under 3.5.1.2 to determine the percentage of the mixture qualifying as an LVP-VOC.

3.6. Final Determination of VOC Content

If a product's compliance status is not satisfactorily resolved under sections 3.4 and 3.5, the Executive Officer may~~will~~ conduct further analyses and testing as necessary based on the Executive Officer's scientific judgment to verify the formulation data.

~~3.6.1 If the accuracy of the supplied formulation data is verified and the product sample is determined to meet the applicable VOC standards, then no enforcement action for violation of the VOC standards will be taken.~~

~~3.6.2~~3.6.1 If the Executive Officer is unable to verify the accuracy of the supplied formulation data, then the Executive Officer may ask~~will request~~ the responsible party to supply additional information to explain the discrepancy.

~~3.6.3~~3.6.2 If there exists a discrepancy that cannot be resolved between the results of Method 310 and the supplied formulation data, then the results of Method 310

shall take precedence over the supplied formulation data. The results of Method 310 shall then determine if the product is in compliance with the applicable VOC standards, and may be used to establish a violation of CARB regulations.

4 CALCULATION OF VOC CONTENT

~~This section specifies the procedure for determining the final VOC content of a product, which is reported as percent by weight of VOC. Effective January 1, 2015, for non-aerosol "Multi-purpose Solvent" and "Paint Thinner" products sold, supplied, offered for sale, or manufactured for sale in the South Coast Air Quality Management District (SCAQMD) the final VOC content is reported as grams of VOC per liter of material (g/L) as set forth in section 4.2.4.~~

4.1 Article 1. Antiperspirants and Deodorants

This section specifies the equations that shall be used to calculate the Medium Volatility Organic Compound (MVOC) and High Volatility Organic Compound (HVOC), of consumer products under section 94500, which shall be reported as percent by weight.

4.1.1 Aerosol Products

4.1.1.1 The following equations shall be used to calculate the HVOC of aerosol products, which shall be reported as percent by weight:

$$\% \text{ HVOC} = \left[\sum_{i=1}^{h} \left(\frac{HV}{WL + WP}\right)_i\right] \times 100$$

Where:

HV = weight of HVOC compound (g), in product.

WL = weight in grams (g) of a non-aerosol sample or the non-propellant portion of an aerosol sample, excluding container and packaging.

WP = weight (g) of propellant.

h = number of HVOC compounds identified.

4.1.1.2 The following equations shall be used to calculate the MVOC of aerosol products, which shall be reported as percent by weight:

$$\% \text{ MVOC} = \left[\sum_{i=1}^{m}\left(\frac{MV}{WL + WP}\right)_i\right] \times 100$$

Where:

MV = weight of MVOC compound (g), in product.

m = number of MVOC compounds identified.

4.1.2 Non-Aerosol Products

4.1.2.1 The following equations shall be used to calculate the HVOC of non- aerosol products, which shall be reported as percent by weight:

$$\% \text{ HVOC} = \left[\sum_{i=1}^{h}\left(\frac{HV}{WL}\right)_i\right] \times 100$$

4.1.2.2 The following equations shall be used to calculate the MVOC of non- aerosol products, which shall be reported as percent by weight:

$$\% \text{ MVOC} = \left[\sum_{i=1}^{m}\left(\frac{MV}{WL}\right)_i\right] \times 100$$

4.2 Article 2. Consumer Products

This section specifies the equations that shall be used to calculate the VOC content of a product.

~~4.1~~4.2.1 Aerosol Products

~~4.1.1~~4.2.1.1 For aerosol products, except those containing LVP-VOC, the percent VOC content shall be calculated using the following equation:

~~$$\% \text{ VOC} = \frac{WL\,(TV - A - H - EL) + (WP - EP)}{WL + WP} \times 100$$~~

$$\% \text{ VOC} = \left[\frac{\text{WL} (\text{TV} - \text{A} - \text{H} - \text{EL}) + (\text{WP} - \text{EP})}{\text{WL} + \text{WP}}\right]$$

Where[2]:

WL = weight ~~in grams (g),~~ of a non-aerosol sample or the non-propellant portion of an aerosol sample, excluding container and packaging.

TV = weight fraction of total volatile content~~material~~ in a non-aerosol sample or in the non-propellant portion of an aerosol sample.

A = weight fraction of ammonia (as NH^{+}) in a non-aerosol sample or in the non-propellant portion of an aerosol sample.

H = weight fraction of water in a non-aerosol sample or in the non-propellant portion of an aerosol sample.

EL = weight fraction of exempt compound(s) in a non-aerosol sample or in the non-propellant portion of an aerosol sample.

WP = weight (g) of propellant.

EP = weight (g) of exempt compound(s)~~compounds~~ in propellant

~~4.1.2~~4.2.1.2 For aerosol products containing LVP-VOC, the percent VOC content shall be calculated using the following equation:

~~$$\% \text{ VOC} = \frac{\text{WL} [(1 - \text{H}) \times (1 - \text{LVP}) - \text{EL}] + (\text{WP} - \text{EP})}{\text{WL} + \text{WP}} \times 100$$~~

$$\%\text{VOC} = \left[\frac{\text{WL} [(1 - \text{H}) \times (1 - \text{LVP}) - \text{EL}] + (\text{WP} - \text{EP})}{\text{WL} + \text{WP}}\right] \times 100$$

Where:

LVP = weight fraction of LVP-VOC compounds and/or mixtures in the non-propellant, non-aqueous portion.

1 – H = weight fraction of the non-propellant portion that does not contain water

1 – LVP = weight fraction of the non-propellant, non-aqueous portion that is volatile.

Volatile compounds, such as ammonia, that do not meet the definition of a VOC in the Consumer Products Regulations will not count toward the total percent VOC content of a product.

~~4.2~~4.2.2 Non-Aerosol Products

~~4.2.1~~4.2.2.1 For non-aerosol products, that do not ~~except those~~ contain~~ing~~ LVP-VOC, the percent VOC content shall be calculated using the following equation:

$$\% \text{ VOC} = (TV - A - H - EL) \times 100$$

~~4.2.2~~4.2.2.2 For non-aerosol products containing LVP-VOC, the percent VOC content shall be calculated using the following equation:

$$\% \text{ VOC} = [(1 - H) \times (1 - LVP) - EL] \times 100$$

4.2.3 For consumer products with VOC embedded within a delivery substrate, such as Fabric Softener – Single Use Dryer Product, VOC shall be calculated as total weight (g) VOC per use.~~the grams of VOC per sheet shall be calculated as follows:~~

~~[2] Alternate test methods, as provided in section 7.0.~~

4.2.3.1 For those products, that do not contain LVP-VOC:

~~Total Grams VOC per Sheet = (TV - A - H - EL) x WS~~

VOC per use (g) = (TV - A - H - EL) × TW

Where:

TW = total weight (g) of VOC and delivery substrate per use, excluding container and packaging.

4.2.3.2 For those products containing LVP-VOC:

VOC per use (g) = [(1 - H) × (1 - LVP) - EL] × TW

~~Total Grams VOC per Sheet with LVP = [(1 - H) x (1 - LVP) - EL] x WS~~

~~Where:~~

~~WS = weight (g) of single dryer sheet.~~

4.2.4 Effective January 1, 2015, for non-aerosol "Multi-purpose Solvent" and "Paint Thinner" products sold, supplied, offered for sale, or manufactured for sale for use in the SCAQMD, grams of VOC per liter of material (g/L) shall be calculated using the following equation:

$$^{g}/_{L}\ VOC = \frac{WM \times (TV - H - EL)}{VM}$$

Where:

WM = weight of the material in

grams. VM = volume of the

material in liters.

EL = weight fraction of exempt compounds including the weight fraction of methyl esters with 17 or more carbon atoms in the total volatile material.

~~4.3~~4.2.5 Consumer products subject to low VOC limits (≤~~below~~ 5.0%) may have their VOC content characterized by a low- level direct determination.

~~4.3.1~~4.2.5.1 For aerosol products the percent VOC content may be calculated using the following equation:

$$\%\ VOC = \frac{WL[\sum V_n] + (WP - EP)}{WL + WP} \times 100$$

$$\%\ VOC = \left[\frac{WL\left(\sum_{i=1}^{n} V_i\right) + (WP - EP)}{(WL + WP)}\right] \times 100$$

Where:

V = weight fraction of VOC ~~non-exempted VOCs~~ in the non-propellant portion.

n = number of VOC(s) ~~non-exempted VOCs~~ in the non-propellant portion.

~~4.3.2~~4.2.5.2 For non-aerosol products the percent VOC content may~~shall~~ be calculated using the following equation:

$$\%\ VOC = \left(\sum_{i=1}^{n} V_i\right) \times 100$$

~~$$\% \text{ VOC} = \left[\sum V_n \right] \times 100$$~~

5 TESTING TO DETERMINE ROC

5.1 ~~Testing begins when the~~ The Executive Officer may select~~s~~ a product for analysis under this Method 310. After selection of the product, t~~T~~he Executive Officer shall~~will~~ maintain ~~sample~~ chain of custody for that product throughout the ~~selection and~~ analytical process, by ensuring that the product is kept in a secure location. ~~When a product is selected for testing, the Executive Officer will request the responsible party to supply the product formulation data specified in Title 17, CCR, Consumer Products section 94526(b)(1). The responsible party shall supply the requested information within 25 working days. Information submitted to the Executive Officer may be claimed as confidential; such information will be handled in accordance with the confidentiality procedures specified in Title 17, CCR, Disclosure of Public Records sections 91000 to 91022.~~[2]

5.2 Initial Testing of Aerosol Products

If the sample is an aerosol product, the aerosol propellant shall be~~is~~ separated from the non-propellant portion of the product using ASTM D3074-94 (as modified in Appendix A for metal aerosol container) or ASTM D3063-94 (as modified in Appendix A for glass aerosol container). The propellant portion is analyzed for ROC(s)~~ROCs~~ and other compound(s)~~compounds~~ by using US EPA Method 18. The remaining non-propellant portion of the product shall be~~is then~~ analyzed as specified in section 5.3.

5.3 Initial Testing of Non-Aerosol Products or the Non-Propellant Portion of Aerosol Products

The non-aerosol product or non-propellant portion of the aerosol product shall be~~is~~ analyzed to determine the ROC(s) content present in the sample, including the presence of any prohibited compound(s)~~compounds~~. This analysis shall be~~is~~ conducted by performing the following tests, as applicable:[3]

5.3.1 ~~Gravimetric analysis of samples to determine the weight percent of t~~Total volatile content~~material~~ determination, using one or more of the following: US EPA Method 24, US EPA Method 24A, ASTM D2369-01~~.~~;

5.3.2 ~~Determination of sample w~~Water content~~. For~~ determination, by either using ~~of water content either~~ ASTM D4017-96a (including ASTM E203-01),

or ASTM D3792-99 ~~may be used~~, or by averaging results from both ASTM D4017-96a (including ASTM E203-01) and ASTM D3792-99~~procedures may be averaged and that value reported.~~;

5.3.3 ~~Determination of a~~Ammonium content determination, using either ASTM D1426-98 or US EPA Method 300.7~~.~~;

5.3.4 ~~Determination of k~~Ketone~~s~~ and/or alcohol content determination, using one or more of the following: NIOSH Method 1300, NIOSH Method 1400, NIOSH Method 1401, NIOSH Method 1402, NIOSH Method 1403~~.~~;

5.3.5 ~~Direct determination of ROC and, if present, p~~Prohibited content determination, if present, using one or more of the following: ~~compounds (~~US EPA Method 18, US EPA Method 8240B, US EPA Method 8260B, ASTM D859-00, NIOSH Methods 1400, NIOSH Method 1401, NIOSH Method 1402, NIOSH Method 1403, ~~1403, and modified~~ ASTM D5443-14~~D5443-04~~), ASTM D5880-15; and~~.~~

~~5.3.6 Determination of metal content using ASTM D5381-93 (2009).~~

~~5.3.7 Determination of specular gloss using ASTM D523-08 (2008).~~

~~5.3.8 Determination of acid content using ASTM D1613-06 (2006).~~

~~5.3.9~~5.3.6~~For h~~Hydrocarbon ~~compound~~ content determination using one or more of the following: ASTM D6730-01(2016), ASTM D4057-12, ASTM D4177-16e1, ASTM D4626-95(2015), ASTM D5443-14, ASTM D5880-15.

5.4 Initial Determination ~~and Verification~~ of ROC Content

If t~~T~~he Executive Officer makes a~~will determine the~~ ROC content determination, they shall do so ~~by verifying formulation data~~ pursuant to sections 5.2 and 5.3. Only those components with concentrations equal to or greater than 0.1 percent by weight shall~~will~~ be reported.

Using the equation specified in section 6~~Based on formulation data and the analysis conducted under section 5~~, the Executive Officer shall~~will~~ make an initial determination of whether the product meets the applicable requirements specified in the Consumer Products Regulations, under sections 94509 and 94522~~CARB regulations~~. If initial results show that the product does not meet the applicable requirements, the Executive Officer may perform additional testing to confirm the initial results.

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[2] Alternative test methods may be used, as provided in section 8 of Method 310.

[3] ~~Alternate test methods may be used, as provided in section 7.0.~~

5.4.1 Using the equation specified in section 6~~Based on formulation data and the analysis conducted under section 5~~, the Executive Officer shall~~will~~ make an initial determination of whether the product meets the applicable requirements specified in the Consumer Products Regulations, under sections 94509 and 94522~~CARB regulations~~. If initial results show that the product does not meet the applicable requirements, the Executive Officer may perform additional testing to confirm the initial results.

5.4.2 If the results obtained under section 5.4.1 show that the product does not meet the applicable reactivity limits set forth in the CARB regulations, the Executive Officer may ask the responsible party to supply the product formulation data specified in section 94526 to confirm compliance with the applicable reactivity limit. The responsible party shall supply the requested information within 25 working days of the request. Information submitted to the Executive Officer may be claimed as confidential. The Executive Officer shall handle confidential information in accordance with Title 17, CCR, sections 91000 to 91022. Failure to respond to an Executive Officer request for this information is a violation.

5.4.3 If the Executive Officer determines, based on testing, information they may receive from the responsible party, and any other applicable evidence, that the product does not comply with the applicable Reactivity Limit, the Executive Officer will take appropriate enforcement action.

5.5 Final Determination of ROC Content

If a product's status is not satisfactorily resolved under section 5.1 - 5.4, the Executive Officer may conduct additional analyses and testing as necessary based on the Executive Officer's scientific judgment to verify the formulation data.

5.5.1 If the Executive Officer is unable to verify the accuracy of the supplied formulation data, then the Executive Officer may ask~~will request~~ the responsible party to supply additional information to explain the discrepancy.

~~5.5.2 If the additional information supplied by the responsible party shows that the product does not meet the applicable requirements, then the Executive Officer will take appropriate enforcement action.~~

~~5.5.3 If the responsible party fails to provide additional information as specified in section 5.5.1, the initial determination of ROC content under section 5.1 – 5.4 shall determine if the product is in compliance with the applicable reactivity limits. This determination may be used to establish a violation of CARB regulations.~~

~~5.5.4~~5.5.2 If there exists a discrepancy that cannot be resolved between the results of Method 310 and the formulation data or additional information supplied by the responsible party, then the results of Method 310 shall take precedence over the supplied formulation data or additional information. The results of Method 310 shall then determine if the product is in compliance with the applicable requirements, and may be used to establish a violation of CARB regulations.

6 CALCULATION OF PWMIR USING ROC CONTENT

This section specifies the equation that shall be used to calculate the PWMIR:

$$PWMIR = \left[\sum_{i=1}^{r}\left(\frac{RW}{WL + WP}\right)_i \times MIR_i\right]$$

Where:

RW = weight of ROC compound and/or hydrocarbon solvent (g) in product.

r = number of ROC compounds and hydrocarbon solvents identified.

MIR = maximum incremental reactivity (MIR) value, as stated in Title 17, CCR, sections 94700 and 94701.

WL = weight (g) of a non-aerosol sample or the non-propellant portion of an aerosol sample, excluding container and packaging.

WP = weight (g) of propellant.

~~6~~7 METHOD PRECISION AND ACCURACY

~~6.1~~7.1 The precision of Method 310 for determining VOC content was evaluated using seven representative products with known VOC contents ranging from 6.2 to 81.2 percent VOC by weight. Each sample was divided into six portions, and each portion was separately analyzed to determine the VOC content. Based on the results of this analysis, the 95 percent confidence interval for Method 310 is 3.0 percent by weight.

~~6.2~~7.2 For determining the percent by weight of the individual ingredients in aerosol coating products, the precision and accuracy of the determination for each ingredient is governed by the precision and accuracy of the test method used to ascertain the percent by weight of each ingredient.

~~7~~8 ~~ALTERNATE~~ ALTERNATIVE TEST METHODS

Alternative test methods which are shown to accurately determine the concentration of VOC or components ~~in antiperspirant/deodorants, consumer products, or aerosol coating products (or their emissions)~~ may be used upon written approval of the Executive Officer, as described in the Consumer Products Regulations, sections 94506, 94515, and 94526, respectively.

Method 310 - Appendix A

PROPELLANT COLLECTION PROCEDURES

1 APPLICATION

These procedures ~~applies to~~ modify ASTM D3074-94 and D3063-94. These procedures shall be used to ~~allow~~ collect~~ion of~~ the propellant for the analysis and density measurement for metal aerosol containers and glass aerosol containers, respectively, where required by Method 310. These modified procedures use~~also retain~~ the same aerosol standard terminology as listed in ASTM D3064-97.

2 LIMITATIONS

Nitrogen analysis: Nitrogen may be used as a component of the propellant system. Ambient air is 78 percent nitrogen and may be present as a contaminant in the system prior to sample collection. This risk of nitrogen contamination shall be~~is~~ eliminated by sweeping out any connecting lines prior to attaching the propellant collection bag ~~with product before starting sample collection~~. This procedure can~~will~~ eliminate or reduce nitrogen contamination to less than 0.1 percent by weight of the sample, and therefore, the analysis of the propellant gas will be unaffected.

3 EQUIPMENT AND SUPPLIES~~APPARATUS AND MATERIALS~~

3.1. Propellant Collection System: See Figure 1 (metal containers) and Figure 3 (glass containers).

3.2. Propellant Collection Bags equipped with slip valve and septum.

3.3. Density Measurement

3.3.1 250 mL gas dilution bulb, or

3.3.2 Density/Specific gravity meter meeting the following minimum specifications:

3.3.1 Measurement Range: 0 – 3 +/- 0.00001 g/cm3

3.3.2 Measurement Temperature Range: 4°C ~ 70°C.

3.4. Balance, capable of accurately weighing to 0.1 mg

3.5. Sample Venting Platform. See Figure 2[1] (metal containers) and Figure 4[2] (glass containers).

3.6. Platform Shaker, equivalent to Thermolyne M49125

3.7. Cork Rings, 80 x 32 mm

4 PROCEDURE

4.1 Propellant Collection for Metal Aerosol Containers. This process shall be followed in the same order as outlined below.

4.1.1 Close valves on the Propellant Collection System on the product being tested (see Figure 1).

4.1.2 Remove the actuator from the valve on the aerosol can and weigh the can to the nearest 0.01 g.

4.1.3 Place the aerosol can in an inverted position onto the Sample Venting Platform, stabilized by cork rings.

4.1.4 Slowly raise the hydraulic jack until it pierces the can ~~is pierced~~.

4.1.5 Vent the can until the propellant is seen flowing from output 1 (see Figure 1). Collect the propellant from output 1 in the propellant collection bag ~~from output 1~~. Density shall be~~is~~ determined from this same propellant collection bag, as necessary.

4.1.6 After the propellant is collected, close and remove the propellant collection bag and vent the remainder of the propellant.

4.1.7 After the flow ceases from the can, it is removed from the assembly and allowed to vent overnight on a platform shaker, to vent the remainder of the propellant.

4.1.8 ~~Rew~~Weigh the can again to the nearest 0.01 g and record the weight loss ~~(total grams propellant)~~. The can may now be opened for analysis of the non-propellant portion of the sample.

4.2 Propellant Collection for Glass Aerosol Containers. This process shall be followed in the same order as outlined below.

4.2.2 Remove the actuator from the valve of the aerosol glass container and weigh the container, which includes the valve assembly, to the nearest

0.01 g.

[1] ~~See SOP SAS05. Figures 3 and 4.~~
[2] ~~See SOP SAS05, Figure 7.~~

4.2.2 With the container in an inverted position, place the valve onto the tapered adaptor.

4.2.3 Pressurize the air cylinder to actuate the sample container valve onto the tapered adaptor.

4.2.4 Open the sample valve and collect propellant sample into the propellant collection bag. Density shall beis determined from this same propellant collection bag, as necessary.

4.2.5 After the propellant is collected, close and remove the propellant collection bag and vent the remainder of the propellant.

4.2.6 Continue to vent the container on the platform assembly until no pressure registers on the sample gauge and there in no visible propellant flowing from the sampling tube.

4.2.7 Remove the container from the platform.

4.2.8 Punch a small hole into the container valve assembly.

4.2.9 Place the container on a platform shaker to vent the remainder of the propellant.

4.2.10 RewWeigh the container and valve assembly to the nearest 0.01 g and record the weight loss (total grams propellant). The non-propellant portion of the sample is ready to be analyzed.

FIGURE 147
PROPELLANT COLLECTION SYSTEM METAL AEROSOL CONTAINER

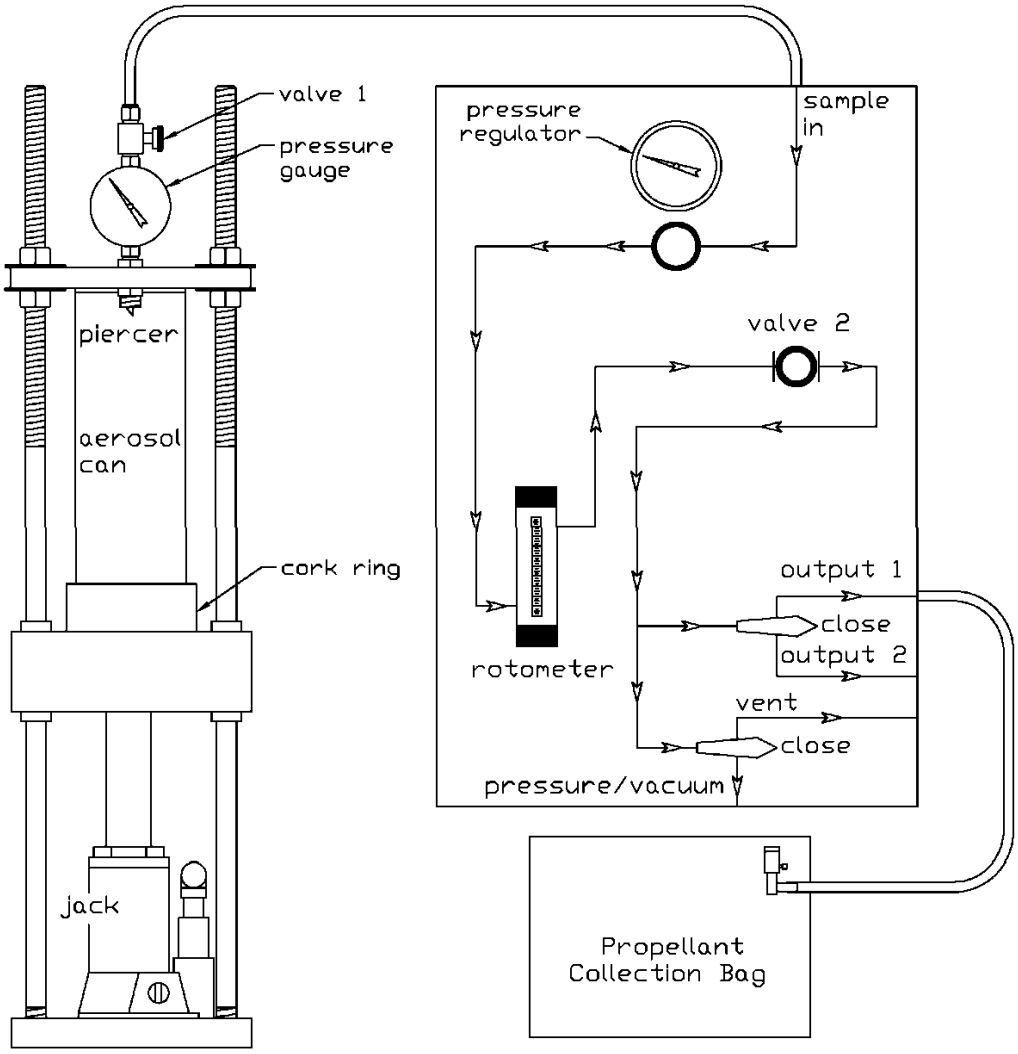
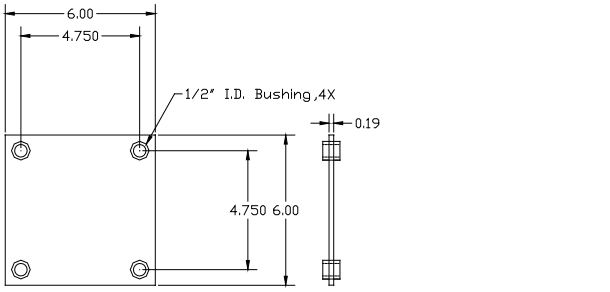
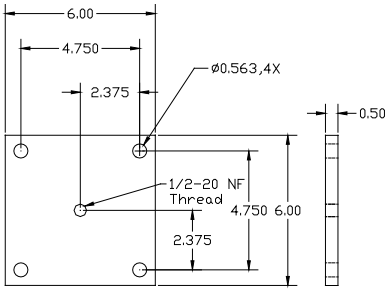


FIGURE 148
SAMPLE VENTING PLATFORM

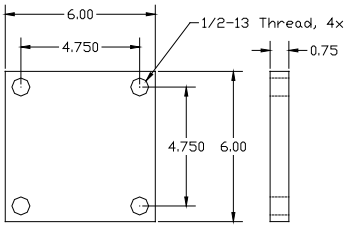
METAL AEROSOL CONTAINER



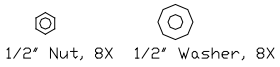
Steel Jack Plate



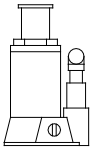
Aluminum Piercing Plate



Base Plate

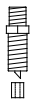


1/2" Nut, 8X 1/2" Washer, 8X

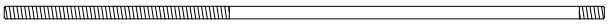


Note: Extend Jack to maximum length (to prevent damage from heat), then tack weld to steel jack plate.

Manual Hydraulic Jack (2 Ton)



Piercer and Viton Gasket



1/2-13 Steel Retaining Rod - 30" Length, 4X

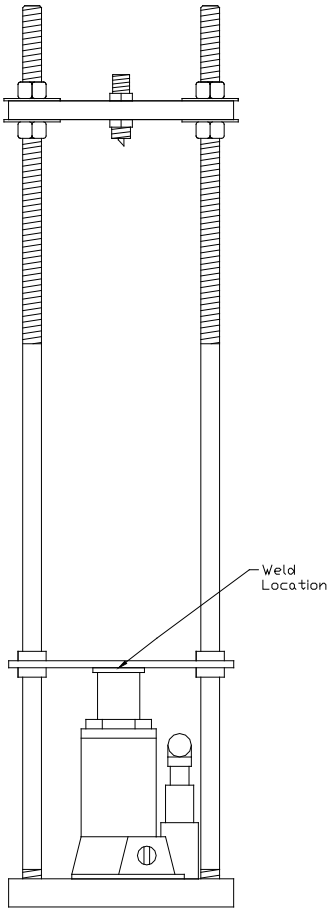


FIGURE 149
PROPELLANT COLLECTION SYSTEM

GLASS AEROSOL CONTAINER

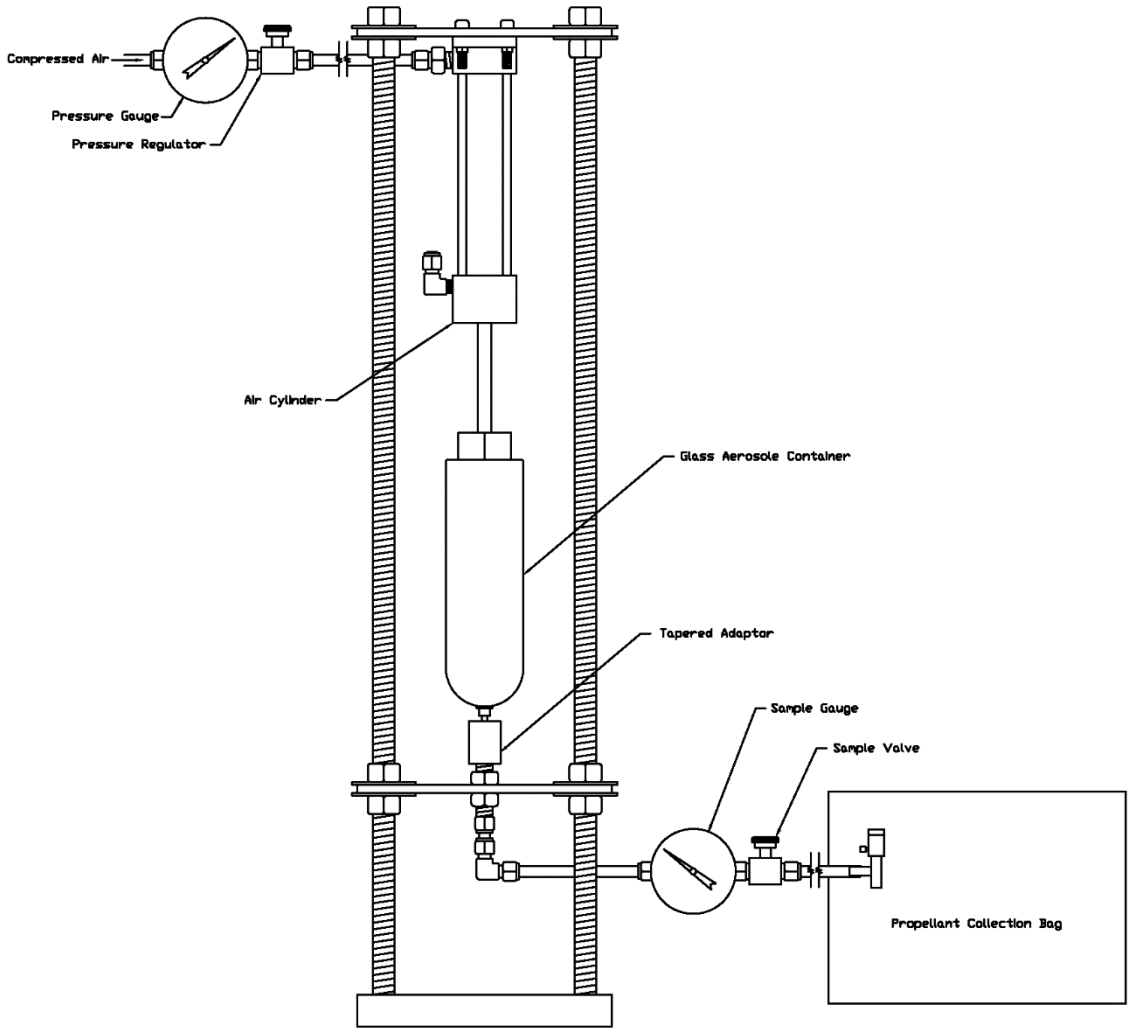
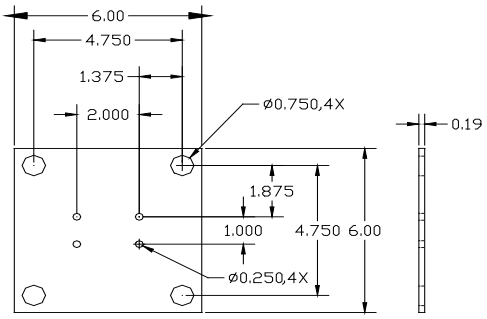
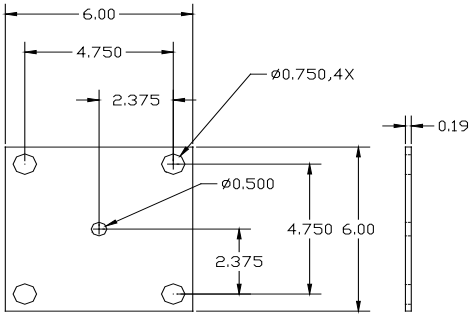


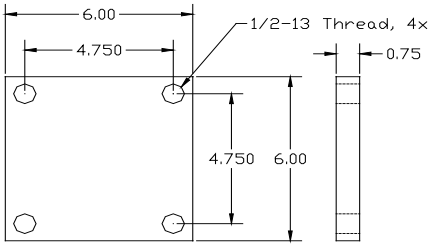
FIGURE 150
SAMPLE VENTING PLATFORM
GLASS AEROSOL CONTAINER



Air Cylinder Mounting Plate



Tapered Adapter Mounting Plate

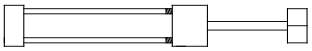


Base Plate

Tapered Adaptor and O-Ring

1/2" Nut, 8X 1/2" Washer, 8X

Air Cylinder Rear Flange Mounting Plate



Air Cylinder, nonrotating drop-in tie rod, 1-1/8" bore, 4" stroke

1/2-13 Threaded Rod - 24" Length, 4X