#### DEPARTMENT OF PUBLIC HEALTH AND ENVIRONMENT

#### **Air Quality Control Commission**

# REGULATION NUMBER 21 CONTROL OF VOLATILE ORGANIC COMPOUNDS FROM CONSUMER PRODUCTS AND ARCHITECTURAL AND INDUSTRIAL MAINTENANCE COATINGS

#### 5 CCR 1001-25

[Editor's Notes follow the text of the rules at the end of this CCR Document.]

#### Outline of Regulation

PART A CONCERNING CONSUMER PRODUCTS

PART B CONCERNING ARCHITECTURAL AND INDUSTRIAL MAINTENANCE COATINGS

PART C STATEMENT OF BASIS, SPECIFIC STATUTORY AUTHORITY, AND PURPOSE

Pursuant to Colorado Revised Statutes Section 24-4-103(12.5), materials incorporated by reference are available for public inspection during normal business hours or copies may be obtained at a reasonable cost from the Air Quality Control Commission (Commission), 4300 Cherry Creek Drive South, Denver, Colorado 80246-1530. The material incorporated by reference may also be available through the United States Government Printing Office, online at www.govinfo.gov. Materials incorporated by reference are those editions in existence as of the date indicated and do not include any later amendments.

## PART A CONCERNING CONSUMER PRODUCTS

- I. Applicability
  - I.A. This part applies to any person who sells, supplies, offers for sale, distributes for sale, or manufactures for sale consumer products in
    - I.A.1. The 8-hour Ozone Control Area.
    - I.A.2. (State Only) Colorado. As marked by (State Only), the requirements are not federally enforceable.
- I.B. This part does not apply to
  - I.B.1. Consumer products manufactured in Colorado solely for shipment and use outside of Colorado.
  - I.B.2. Consumer products that do not comply with the VOC limits in Table 1 as long as the manufacturer or distributor can demonstrate both that the consumer product is intended for shipment and use outside of Colorado and that the manufacturer or distributor has taken reasonable prudent precautions to assure that the consumer product is not distributed to Colorado. Section I.B.2. does not apply to consumer products that are sold, supplied, or offered for sale by any person to retail outlets in Colorado.

- I.B.3. Consumer products that have been granted an Innovative Product exemption by the California Air Resources Board (CARB) under the Innovative Products provisions in Subchapter 8.5, Article 2, Section 94511 (January 2019) or Subchapter 8.5, Article 1, Section 94503.5 (January 2019) of Title 17 of the California Code of Regulations are exempt from the VOC content limits in Table 1 for the period of time during which the CARB Innovative Products exemption remains in effect.
- I.B.4. Consumer products that have been granted an Alternative Control Plan (ACP) by the CARB under the provisions in Subchapter 8.5, Article 4, Sections 94540-94555 (January 2019) of Title 17 of the California Code of Regulations are exempt from the VOC content limits in Table 1 for the period of time during which the CARB ACP agreement remains in effect. Aerosol adhesives, adhesive removers, electronic cleaners, electrical cleaners, energized electrical cleaners, and contact adhesives granted an ACP must be labeled with the term "ACP" or "ACP product" if the product exceeds the applicable VOC limit specified in Table 1. Any manufacturer claiming an ACP agreement must make a copy of the ACP decision available to the Division upon request.
- I.B.5. Consumer products that have been granted a variance by CARB under the Variances provisions in Subchapter 8.5, Article 2, Section 94514 (January 2019) of Title 17 are exempt from complying with the VOC limits established in Table 1 for the period of time during which the variance remains in effect. Any person claiming a variance must make a copy of the variance available to the Division upon request.

#### II. Standards

- II.A. On or after May 1, 2020, no person can manufacture for sale in Colorado any consumer product with a VOC content in excess of the VOC limit specified in Table 1.
- II.B. No person can sell, supply, offer for sale, or distribute for sale in Colorado any consumer product that is manufactured on or after May 1, 2020, with a VOC content in excess of the VOC limit specified in Table 1.
- II.C. On or after May 1, 2021, no person can manufacture for sale in Colorado any consumer product registered under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA; 7 USC Section 136-136y (1996)) in excess of the VOC limits in Table 1.
- II.D. No person can sell, supply, offer for sale, or distribute for sale in Colorado any consumer product registered under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA; 7 USC Section 136-136y (1996)) and manufactured on or after May 1, 2021, with a VOC content in excess of the VOC limits in Table 1.
- II.E. Effective May 1, 2020, and until May 1, 2021, no person can manufacture for sale, sell, supply, or offer for sale any flammable or extremely flammable, as labeled or meeting the criteria in Title 16 CFR Section 1500.3(c)(6) (February 27, 2018), paint thinner or multipurpose solvent labeled as a clean-up solvent or paint clean-up product unless the product is clearly and prominently labeled with
  - II.E.1. "DANGER," "WARNING," or "CAUTION" and "Formulated to meet California VOC limits; see warnings on label"; or
  - II.E.2. The common name of the chemical compound (e.g., acetone, methyl acetate, etc.) that results in the product meeting the criteria for flammable or extremely flammable.

- II.F. Charcoal lighter material products must be issued a certification in accordance with Subchapter 8.5, Article 2, Section 94509(h) (January 1, 2019) of Title 17 of the California Code of Regulations.
- II.G. For consumer products for which the label, packaging, or accompanying literature specifically states that the product should be diluted with water or non-VOC solvent prior to use, the limits specified in Table 1 apply to the product only after the minimum recommended dilution has taken place. For purposes of this part, "minimum recommended dilution" does not include recommendations for incidental use of a concentrated product to deal with limited special applications such as hard to remove soils or stains.
- II.H. For consumer products for which the label, packaging, or accompanying literature states that the product should be diluted with any VOC solvent prior to use, the limits specified in Table 1 apply to the product only after the maximum recommended dilution has taken place.
- II.I. For consumer products for which the label, packaging, or accompanying literature indicates that the product may be used, or is suitable for use, as a consumer product for which a lower VOC limit is specified in Table 1, then the lowest VOC limit applies. This requirement does not apply to general purpose cleaners, antiperspirant/deodorant products, insecticide foggers, or aerosol lawn and garden insecticides claiming to kill insects or other arthropods.
- II.J. Consumer products specified in Table 1 cannot contain any of the following
  - II.J.1. CFC-11 (trichlorofluoromethane).
  - II.J.2. CFC-12 (dichlorodifluoromethane).
  - II.J.3. CFC-113 (1,1,1-trichloro-2,2,2-trifluoroethane).
  - II.J.4. CFC-114 (1-chloro-1,1-difluoro-2-chloro-2,2-difluoroethane).
  - II.J.5. CFC-115 (chloropentafluoroethane).
  - II.J.6. Halon 1211 (bromochlorodifluoromethane).
  - II.J.7. Halon 1301 (bromotrifluoromethane).
  - II.J.8. Halon 2402 (dibromotetrafluoroethane).
  - II.J.9. HCFC-22 (chlorodifluoromethane).
  - II.J.10. HCFC-123 (2,2-dichloro-1,1,1-trifluoroethane).
  - II.J.11. HCFC-124 (2-chloro-1,1,1,2-tetrafluoroethane).
  - II.J.12. HCFC-141b (1,1-dichloro-1-fluoroethane).
  - II.J.13. HCFC-142b (1-chloro-1,1-difluoroethane).
  - II.J.14. 1,1,1-trichloroethane.
  - II.J.15. Carbon tetrachloride.

- II.K. The following consumer products cannot contain trichloroethylene in a combined amount greater than 0.01 percent by weight (i.e., an impurity)
  - II.K.1. Adhesive removers.
  - II.K.2. Aerosol adhesives.
  - II.K.3. Bathroom and tile cleaners.
  - II.K.4. Contact adhesives.
  - II.K.5. Construction, panel, floor covering adhesives.
  - II.K.6. Electrical cleaners.
  - II.K.7. Electronic cleaners.
  - II.K.8. Electronic cleaners labeled as energized electronic equipment use only.
  - II.K.9. Footwear or leather care products.
  - II.K.10. General purpose cleaners.
  - II.K.11. General purpose degreasers.
  - II.K.12. Graffiti removers.
  - II.K.13. Multi-purpose solvent.
  - II.K.14. Oven or grill cleaners.
  - II.K.15. Paint thinners.
- II.L. The medium volatility organic compound (MVOC) content specified for antiperspirants or deodorants does not apply to ethanol.
- II.M. Paint thinners and multi-purpose solvents cannot contain greater than one percent (1%) aromatic compound content by weight.
- II.N. The VOC content limits in Table 1 do not apply to
  - II.N.1. Any LVP-VOC.
  - II.N.2. Fragrances up to a combined level of 2 percent by weight.
  - II.N.3. Colorants up to a combined level of 2 percent by weight in any antiperspirant or deodorant.
  - II.N.4. VOCs in antiperspirants or deodorants that contain more than 10 carbon atoms per molecule and for which the vapor pressure is unknown or 2 mm Hg or less at 20°C.
  - II.N.5. Air fresheners that are comprised entirely of fragrance, less compounds exempt from the definition of VOC.

- II.N.6. Adhesives sold in containers of 1 fluid ounce or less.
- II.N.7. Bait station insecticides designed to be ingested by insects, composed of solid material feeding stimulants with less than 5 percent active ingredients, and in containers less than or equal to 0.5 ounce by weight.
- II.N.8. Solid air fresheners, insecticides, and toilet/urinal care products containing at least 98% para-dichlorobenzene.

Product category	VOC content limit (percent VOCs by weight)
Adhesive removers	<u> </u>
* Floor or wall covering	5
* Gasket or thread locking	50
* General purpose	20
* Specialty	70
Adhesives	
* Aerosol mist spray	65
* Aerosol web spray	55
* Specialty purpose spray adhesive – mounting, automotive engine compartment, and flexible vinyl	70
* Specialty purpose spray adhesive – polystyrene foam and automotive headliner	65
* Specialty purpose spray adhesive – polylolefin and laminate repair/edgebanding	60
* Construction, panel, and floor covering contact	7
* Contact general purpose	55
* Contact special purpose	80
* General purpose	10
* Structural waterproof	15
Air fresheners	
* Single-phase aerosol	30
* Double-phase aerosol	25
* Dual purpose air freshener/disinfectant aerosol	60
* Liquid/pump sprays	18
* Solids/semisolids	3

Antiperspirants	
* Aerosol	40 HVOC, 10 MVOC
* Non-aerosol	0 HVOC, 0 MVOC
Anti-static product	
* Aerosol	80
* Non-aerosol	11
Automotive rubbing or polishing compound	17
Automotive wax, polish, sealant, or glaze	
* Hard paste waxes	45
* Instant detailers	3
* All other forms	15
Automotive windshield cleaner	35
Automotive windshield washer fluids	35
Bathroom and tile cleaners	
* Aerosol	7
* Non-aerosol	1
Brake cleaner	10
Bug and tar remover	40
Carburetor or fuel-injection air intake cleaners	10
Carpet and upholstery cleaners	
* Aerosol	7
* Non-aerosol (dilutables)	0.1
* Non-aerosol (ready-to-use)	3
Charcoal lighter material	See Section II.F.
Cooking spray, aerosol	18
Deodorants	
* Aerosol	0 HVOC, 10 MVOC
* Non-aerosol	0 HVOC, 0 MVOC
Disinfectant	
* Aerosol	70
Non-aerosol	1
Dusting aids	
* Aerosol	25
* Non-aerosol	7
Electrical cleaner	45

Electronic cleaner	75
Engine degreasers	
* Aerosol	10
* Non-aerosol	5
Fabric protectants	60
Fabric refresher	
* Aerosol	15
* Non-aerosol	6
Floor polishes or waxes	
* Resilient flooring materials	1
* Non-resilient flooring materials	1
* Wood floor wax	90
Footwear or leather care products	
* Aerosol	75
* Solid	55
* Other forms	15
Furniture maintenance products	
* Aerosol	17
* Non-aerosol (except solid or paste)	3
General purpose cleaners	
* Aerosol	8
* Non-aerosol	4
General purpose degreasers	
* Aerosol	10
* Non-aerosol	4
Glass cleaners	
* Aerosol	12
* Non-aerosol	4
Graffiti remover	
* Aerosol	50
* Non-aerosol	30
Hair mousses	6
Hairshines	55
Hairsprays	55
Hair styling products	

* Aerosol and pump sprays	6
* All other forms	2
Heavy-duty hand cleaner or soap	8
Insecticides	
* Crawling bug, aerosol	15
* Crawling bug, all other forms	20
* Flea and tick	25
* Flying bug, aerosol	25
* Flying bug, all other forms	35
* Foggers	45
* Lawn and garden, non-aerosol	3
* Lawn and garden, all other forms	20
* Wasp and hornet	40
Laundry prewash	
* Aerosols/solids	22
* All other forms	5
Laundry starch/sizing/fabric finish products	4.5
Metal polishes/cleansers	30
Multi-purpose lubricant (excluding solid or semi-solid products)	50
Multi-purpose solvent	3
Nail polish remover	1
Non-selective terrestrial herbicide, non-aerosols	3
Oven or grill cleaners	
* Aerosol	8
* Non-aerosol	4
Paint remover or strippers	50
Paint thinner	3
Penetrants	50
Rubber/vinyl protectants	
* Aerosol	10
* Non-aerosol	3
Sanitizer	
* Aerosol	70
* Non-aerosol	1
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Sealants and caulking compounds	4
Shaving creams	5
Shaving gel	4
Silicone-based multi-purpose lubricants (excluding solid or semi-solid products)	60
Spot removers	
* Aerosol	25
* Non-aerosol	8
Temporary hair color, aerosol	55
Tire sealants and inflators	20
Toilet/urinal care	
* Aerosol	10
* Non-aerosol	3
Undercoatings, aerosol	40
Wood cleaner	
* Aerosol	17
* Non-aerosol	4

## III. Container labeling

- III.A. The manufacturer of any consumer product subject to a VOC limit in Table 1, except products registered under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA; 7 U.S.C. Section 136-136y) (1996) and products containing VOCs at 0.10 percent by weight or less, must clearly display on the container or package the date the product was manufactured or a date code representing the date of manufacture. The date or date code must be displayed on the container such that it is readily observable without removing or disassembling any portion of the product container or packaging.
- III.B. If the label on a special purpose spray adhesive indicates that the product is suitable for use on any substrate or application not listed in the definition for special purpose spray adhesive, the product must be classified as either a web spray adhesive or mist spray adhesive and meet the associated limit in Table 1.
- III.C. The label on non-aerosol floor wax strippers must specify a dilution ratio for light or medium build-up of polish that results in an as-used VOC concentration of 3 percent by weight or less. The label on a non-aerosol floor wax stripper that is also intended to be used for removal of heavy build-up of polish that results must specify a dilution ratio for heavy build-up of polish that results in an as-used VOC concentration of 12 percent by weight or less.
- III.D. The label on energized electrical cleaners must clearly display "Energized equipment use only. Not to be used for motorized vehicle maintenance or their parts."
- III.E. The label on zinc rich primers must clearly display "for professional use only," "for industrial use only," or "not for residential use" or "not intended for residential use."

- III.F. The label on aerosol adhesives, adhesive removers, electronic cleaners, electrical cleaners, energized electrical cleaners, and contact adhesive products must clearly display
  - III.F.1. The product category.
  - III.F.2. The applicable VOC standard for the product, except energized electrical cleaners, as a percentage by weight.
  - III.F.3. For special purpose spray adhesives, the applicable substrate and/or application that qualifies the product as special purpose.

## IV. Reporting

- IV.A. Manufacturers of a solid air freshener, insecticide, or toilet/urinal care consumer product that contains at least 98% para-dichlorobenzene must maintain records necessary to demonstrate the para-dichlorobenzene content. These records must be maintained for a minimum of three (3) years and made available to the Division within 90 days after written notice.
- IV.B. Manufacturers of consumer products that have been granted an Innovative Product exemption must maintain records necessary to demonstrate that the exemption applies and remains in effect. These records must be maintained for a minimum of three (3) years and made available to the Division within 90 days after written notice.
- IV.C. Manufacturers of consumer products that have been granted an Alternative Control Plan agreement must maintain records necessary to demonstrate that the agreement applies and during what time period the agreement was in effect. These records must be maintained for a minimum of three (3) years and made available to the Division within 90 days after written notice.
- IV.D. Upon 90 days written notice, the Division may require any responsible party to report any of the following information for any consumer product subject to a VOC limit in Table 1. If the responsible party does not have or does not provide the information requested by the Division, the Division 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.
  - IV.D.1. The company name of the responsible party, address, telephone number, and designated contact person.
  - IV.D.2. Any claim of confidentiality made pursuant to Colorado requirements.
  - IV.D.3. The consumer product brand name for each consumer product, product label, and product category to which the consumer product belongs.
  - IV.D.4. The applicable product form(s) listed separately.
  - IV.D.5. An identification of each product brand name and form as a "Household Product," "I&I Product," or both.
  - IV.D.6. Colorado sales in pounds per year, to the nearest pound, and the method used to calculate Colorado sales for each consumer product.

- IV.D.7. For information submitted by multiple companies, an identification of each company which is submitting relevant data separate from that submitted by the responsible party.
- IV.D.8. For each consumer product brand name, the identity, including the specific chemical name and associated Chemical Abstract Services (CAS) number, of
  - IV.D.8.a. Each Table B compound.
  - IV.D.8.b. Each LVP-VOC that is not a fragrance.
- IV.D.9. For each consumer product brand name, the net percent by weight of the total product, less container and packaging, rounded to the nearest one-tenth of a percent, for each of the following
  - IV.D.9.a. Total Table B compounds.
  - IV.D.9.b. Total LVP-VOCs that are not fragrances.
  - IV.D.9.c. Total all other carbon-containing compounds that are not fragrances.
  - IV.D.9.d. Total fragrance.
  - IV.D.9.e. For consumer products containing greater than two percent by weight fragrance, the percent of fragrance that are LVP-VOCs and the percent of fragrance that are all other carbon-containing compounds.
  - IV.D.9.f. Total all non-carbon-containing compounds.
  - IV.D.9.g. Total para-dichlorobenzene.
- IV.D.10. The type of propellant (e.g., Type A, Type B, or a blend of the different types) and weight percent comprised of propellant for each consumer product, if applicable.
- IV.D.11. The net percent by weight of each ozone-depleting compound listed in Section II.J. and contained in any amount greater than 0.1 percent be weight, if applicable.
- IV.D.12. Documentation that the consumer product meets the applicable VOC content limit specified in Table 1.
- IV.D.13. Documentation explaining the date portion of the date code indicating the date of manufacture.

### V. Test methods

V.A. Testing to determine compliance with the requirements of this part, except for charcoal lighter material products (see Section II.F.), may be performed using CARB Method 310, Determination of Volatile Organic Compounds (VOC) in Consumer Products, adopted September 25, 1997, and as last amended on December 31, 2018, or through calculation of the VOC content from records of the amounts of constituents used to make the product if

- V.A.1. The manufacturer keeps accurate records for each day of production of the amount and chemical composition of the individual product constituents. Records must be maintained for three (3) years and made available to the Division upon request; and
- V.A.2. VOC content is calculated according to the following equation:

VOC content =  $((B-C)/A) \times 100$ 

Where

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

B = total weight of all VOCs, per unit

C = total weight of VOCs exempted under Section II.N., per unit

- V.A.3. If product records are contradicted by product testing performed using CARB Method 310, the results of CARB Method 310 take precedence.
- V.B. Testing to determine whether a product is a liquid or solid must be performed using ASTM D4359-90(2000)e1 "Standard Test Method for Determining Whether a Material Is a Liquid or a Solid" (2012).

#### VI. Definitions

- VI.A. "8-Hour Ozone Control Area" means the Counties of Adams, Arapahoe, Boulder (includes part of Rocky Mountain National Park), Douglas, and Jefferson; the Cities and Counties of Denver and Broomfield; and the following portions of the Counties of Larimer and Weld:
  - VI.A.1. For Larimer County (includes part of Rocky Mountain National Park), that portion of the county that lies south of a line described as follows: Beginning at a point on Larimer County's eastern boundary and Weld County's western boundary intersected by 40 degrees, 42 minutes, and 47.1 seconds north latitude, proceed west to a point defined by the intersection of 40 degrees, 42 minutes, 47.1 seconds north latitude and 105 degrees, 29 minutes, and 40.0 seconds west longitude, thence proceed south on 105 degrees, 29 minutes, 40.0 seconds west longitude to the intersection with 40 degrees, 33 minutes and 17.4 seconds north latitude, thence proceed west on 40 degrees, 33 minutes, 17.4 seconds north latitude until this line intersects Larimer County's western boundary and Grand County's eastern boundary.
  - VI.A.2. For Weld County, that portion of the county that lies south of a line described as follows: Beginning at a point on Weld County's eastern boundary and Logan County's western boundary intersected by 40 degrees, 42 minutes, 47.1 seconds north latitude, proceed west on 40 degrees, 42 minutes, 47.1 seconds north latitude until this line intersects Weld County's western boundary and Larimer County's eastern boundary.
- VI.B. "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.

- VI.C. "Adhesive remover" means a product designed to remove adhesive from either a specific substrate or a variety of substrates but does not include products that remove adhesives intended exclusively for use on humans or animals. For the purposes of this definition, adhesive means a substance used to bond one or more materials including, but not limited to, caulks, sealants, glues, or similar substances used for the purpose of forming a bond.
  - VI.C.1. "Floor and wall covering adhesive remover" means a product designed or labeled to remove floor or wall coverings and associated adhesive from the underlying substrate.
  - VI.C.2. "Gasket or thread locking adhesive remover" means a product designed or labeled to remove gaskets or thread locking adhesives. Gasket or thread locking adhesive remover includes products labeled for dual use as a paint stripper and gasket remover and/or thread locking adhesive remover.
  - VI.C.3. "General purpose adhesive remover" means a product designed or labeled to remove cyanoacrylate adhesives as well as non-reactive adhesives or residues from a variety of substrates. General purpose adhesive remover includes, but is not limited to, products that remove thermoplastic adhesives; pressure sensitive adhesives; dextrin or starch based adhesives; casein glues; rubber or latex-based adhesives; and stickers, decals, stencils, or similar materials. General purpose adhesive remover does not include floor or wall covering adhesive remover.
  - VI.C.4. "Specialty adhesive remover" means a product designed to remove reactive adhesives from a variety of substrates. Reactive adhesives include adhesives that require a hardener or catalyst in order for the bond to occur such as, but not limited to, epoxies, urethanes, and silicones. Specialty adhesive remover does not include gasket or thread locking adhesive remover.
- VI.D. "Aerosol adhesive" means an aerosol product in which the spray mechanism is permanently housed in a non-refillable can designed for hand-held application of adhesive without the need for ancillary hoses or spray equipment. Aerosol adhesives include special purpose spray adhesive, mist spray adhesives, and web spray adhesives.
- VI.E. "Aerosol cooking spray" means any aerosol product designed either to reduce sticking on cooking and baking surfaces or to be applied on food, or both.
- VI.F. "Aerosol product" means a pressurized spray system that dispenses product ingredients by means of a propellant contained in a product or a product's container or a mechanically induced force but does not include pump spray.
- VI.G. "Agricultural use" means the use of any pesticide or method or device for the control of pests in connection with the commercial production, storage, or processing of any animal or plant crop. Agricultural use does not include the sale or use of pesticides in properly labeled packages or containers which are intended for home use (use in a household or its immediate environment), use in structural pest control (use requiring a license), industrial use (use for or in a manufacturing, mining, or chemical process or use in the operation of factories, processing plants, and similar sites), or institutional use (use within or on property necessary for the operation of buildings such as hospital, schools, libraries, auditorium, and office complexes).

- VI.H. "Air freshener" means any product including, but not limited to, sprays, wicks, wipes, diffusers, powders, and crystals, designed or labeled for the purpose of masking odors, or freshening, cleaning, scenting, or deodorizing the air. Air fresheners includes dual purpose air freshener/disinfectant products, which are aerosol products represented on the product container, label, packaging, or attached literature for use as both a disinfectant and an air freshener. Air freshener does not include products that are used on the human body, products that function primarily as cleaning products as indicated on the product label, odor remover/eliminator, toilet/urinal care products, or disinfectants when offered for sale solely through institutional and industrial channels of distribution.
- VI.I. "All other carbon-containing compounds" means other compounds which contain at least one carbon atom and are not a table B compound or a LVP-VOC.
- VI.J. "All other forms" means all consumer product forms for which no form-specific VOC standard is specified and include, but are not limited to, solids, liquids (including the liquid containing or liquid impregnated portion of the cloth or paper wipes), wicks, powders, and crystals.
- VI.K. "Antimicrobial hand or body cleaner or soap" means a cleaner or soap which is designed to reduce the level of microorganisms on the skin through germicidal activity and includes, but is not limited to, antimicrobial hand or body washes/cleaners, food handler hand washes, healthcare personnel hand washes, preoperative skin preparations, and surgical scrubs. Antimicrobial hand or body cleaner or soap does not include prescription drug products, antiperspirants, astringent/toner, deodorant, facial cleaner or soap, general-use hand or body cleaner or soap, hand dishwashing detergent (including antimicrobial), heavy-duty hand cleaner or soap, medicated astringent/medicated toner, and rubbing alcohol.
- VI.L. "Antiperspirant" means any product including, but not limited to, aerosols, roll-ons, sticks, pumps, pads, creams, and squeeze-bottles, that is intended by the manufacturer to be used to reduce perspiration in the human axilla by at least 20 percent in at least 50 percent of a target population.
- VI.M. "Anti-static product" means a product that is labeled to eliminate, prevent, or inhibit the accumulation of static electricity. Anti-static product does not include electronic cleaner, floor polish or wax, floor coating, aerosol coating products, or architectural coatings.
- VI.N. "Architectural coating" means a coating applied to stationary structures and their appurtenances, to mobile homes, to pavements, or to curbs.
- VI.O. "Aromatic compound" means a carbon containing compound, except compounds exempt from the definition of VOC, that contains one or more benzene or equivalent heterocyclic rings and has an initial boiling point less than or equal to 280 degrees C.
- VI.P. "Artist solvent/thinner" means any liquid product, labeled to meet ASTM D4236 94 (March 1, 2005) Standard Practice for Labeling Art Materials for Chronic Health Hazards, and packaged in a container equal to or less than 34 fluid ounces, labeled to reduce the viscosity of, and or remove, art coating compositions or components.
- VI.Q. "Astringent/toner" means any product not regulated as a drug by the United States Food and Drug Administration (FDA) which is applied to the skin for the purpose of cleaning or tightening pores including clarifiers and substrate-impregnated products. Astringent/toner does not include medicated astringent/medicated toner, cold cream, lotion, or antiperspirant.

- VI.R. "Automotive hard paste wax" means an automotive wax or polish that is designed to protect and improve the appearance of automotive paint surfaces, is solid at room temperature, and contains zero percent (0%) water by formulation.
- VI.S. "Automotive instant detailer" means a product designed for use in a pump spray that is applied to the painted surface of automobiles and wiped off prior to the product being allowed to dry.
- VI.T. "Automotive rubbing or polishing compound" means a product designed primarily to remove oxidation, old paint, scratches or "swirl marks", and other defects from the painted surfaces of motor vehicles without leaving a protective barrier.
- VI.U. "Automotive wax, polish, sealant, or glaze" means a product designed to seal out moisture, increase gloss, or otherwise enhance a motor vehicle's painted surfaces and includes, but is not limited to, products designed for use in auto body repair shops, drive-through car washes, and products designed for the general public. Automotive wax, polish, sealant, or glaze does not include automotive rubbing or polishing compounds, automotive wash and wax products, surfactant-containing car wash products, and products designed for use on unpainted surfaces such as bare metal, chrome, glass, or plastic.
- VI.V. "Automotive windshield cleaner" means a product labeled for automotive use only, packaged as an automotive windshield cleaner in the form of a moistened towelette, and designed to be used on automotive windshields, automotive mirrors, and automotive headlights. Automotive windshield cleaner does not include automotive windshield washer fluid.
- VI.W. "Automotive windshield washer fluid" means any liquid designed for use in a motor vehicle windshield washer system either as an antifreeze or for the purpose of cleaning, washing, or wetting the windshield. Automotive windshield washer fluid does not include fluids placed by the manufacturer in a new vehicle.
- VI.X. "Bathroom and tile cleaner" means a product designed or labeled to clean tile or surfaces in bathrooms. Bathroom and tile cleaner does not include toilet/urinal care product.
- VI.Y. "Brake cleaner" means a cleaning product designed to remove oil, grease, brake fluid, brake pad material, or dirt from motor vehicle brake mechanisms.
- VI.Z. "Bug and tar remover" means a product labeled to remove biological-type residues, such as insect carcasses and tree sap, and/or road grime, such as road tar, roadway paint markings, and asphalt, from painted motor vehicle surfaces without causing damage to the finish.
- VI.AA. "Carburetor or fuel-injection air intake cleaners" means a product designed or labeled to remove fuel deposits, dirt, or other contaminants from a carburetor, choke, throttle body of a fuel-injection system, or associated linkages. Carburetor or fuel-injection air intake cleaner does not include products designed or labeled exclusively to be introduced directly into the fuel lines or fuel storage tank prior to introduction into the carburetor or fuel injectors or products designed or labeled exclusively to be introduced during engine operation directly into air vacuum lines by using a pressurized sprayer wand.

- VI.BB. "Carpet and upholstery cleaner" means a cleaning product designed for the purpose of eliminating dirt and stains on rugs, carpeting, and the interior of motor vehicles and/or on household furniture or objects upholstered or covered with fabrics such as wool, cotton, nylon or other synthetic fabrics. Carpet and upholstery cleaner includes, but is not limited to, products that make fabric protectant claims. Carpet and upholstery cleaner does not include general purpose cleaners, spot removers, vinyl or leather cleaners, dry cleaning fluids, or products designed exclusively for use at industrial facilities engaged in furniture or carpet manufacturing.
- VI.CC. "Charcoal lighter material" means any combustible material designed to be applied on, incorporated in, added to, or used with charcoal to enhance ignition. Charcoal lighter material does not include electrical starters and probes, metallic cylinders using paper tinder, natural gas, propane, and fat wood.
- VI.DD. "Colorant" means any pigment or coloring material used in a consumer product for an aesthetic effect, or to dramatize an ingredient.
- VI.EE. "Construction, panel, and floor covering adhesive" means any non-aerosol, one-component adhesive that is designed or labeled for the installation, remodeling, maintenance, or repair of structural and building components that include, but are not limited to, beams, trusses, studs, paneling (drywall or drywall laminates, fiberglass reinforced plastic (FRP), plywood, particle board, insulation board, pre-decorated hardboard or tileboard, etc.), ceiling and acoustical tile, molding, fixtures, countertops or countertop laminates, cove or wall bases, and flooring or subflooring or floor or wall coverings that include, but are not limited to, wood or simulated wood covering, carpet, carpet pad or cushion, vinyl-backed carpet, flexible flooring material, nonresilient flooring material, mirror tiles and other types of tiles, and artificial grass. Construction, panel, and floor covering adhesive does not include floor seam sealer. Construction, panel and floor covering adhesive, does not include units of non-aerosol adhesive, less packaging, which weigh more than one pound and consists of more than 16 fluid ounces.
- VI.FF. "Consumer" means any person who purchases or acquires any consumer product for personal, family, household, or institutional use. Consumer does not include persons acquiring a consumer product for resale.
- VI.GG. "Consumer product" means a chemically formulated product used by household and institutional consumers including, but not limited to, detergents; cleaning compounds; polishes; floor finishes; cosmetics; personal care products; home, lawn, and garden products; disinfectants; sanitizers; aerosol paints; automotive specialty products; and aerosol adhesives. Consumer product does not include other paint products, furniture coatings, or architectural coatings.
- VI.HH. "Contact adhesive" means a non-aerosol adhesive that is designed for application to both surfaces to be bonded together, is allowed to dry before the two surfaces are placed in contact with each other, forms an immediate bond that is impossible, or difficult, to reposition after both adhesive-coated surfaces are placed in contact with each other, and does not need sustained pressure or clamping of surfaces after the adhesive-coated surfaces have been brought together using sufficient momentary pressure to establish full contact between both surfaces. Contact adhesive does not include rubber cements that are primarily intended for use on paper substrates or vulcanizing fluids that are designed and labeled for tire repair only. Contact adhesive does not include units of adhesive, less packaging, which consist of more than one gallon.
- VI.II. "Contact adhesive general purpose" means any contact adhesive that is not a contact adhesive special purpose.

- VI.JJ. "Contact adhesive special purpose" means a contact adhesive that: is used to bond melamine-covered board, unprimed metal, unsupported vinyl, Teflon, ultra-high molecular weight polyethylene, rubber, high pressure laminate or wood veneer 1/16 inch or less in thickness to any porous or nonporous surface, and is sold in units of product, less packaging, that contain more than eight fluid ounces; or is used in automotive applications that are automotive under-the-hood applications requiring heat, oil or gasoline resistance, or are body-side molding, automotive weatherstrip or decorative trim.
- VI.KK. "Container/packaging" means the part or parts of the consumer or institutional product which serve only to contain, enclose, incorporate, deliver, dispense, wrap or store the chemically formulated substance or mixture of substances which is solely responsible for accomplishing the purposes for which the product was designed or intended. Container/packaging includes any article onto or into which the principle display panel and other accompanying literature or graphics are incorporated, etched, printed or attached.
- VI.LL. "Crawling bug insecticide" means any insecticide product that is designed for use against ants, cockroaches, or other household crawling arthropods, including, but not limited to, 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. A 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, and the family Pyroglyphidae.
- VI.MM. "Date-code" means the day, month and year on which the consumer product was manufactured, filled, or packaged, or a code indicating such a date.
- VI.NN. "Deodorant" means any product including, but not limited to, aerosol, roll-ons, sticks, pumps, pads, creams, and squeeze-bottles, that indicates or depicts on the container or packaging, or on any sticker or label affixed thereto, that the product can be used on or applied to the human axilla to provide a scent and/or minimize odor. Deodorant includes deodorant body sprays that indicate or depict on the container, packaging, or label that it can be used on or applied to the human axilla.
- VI.OO. "Deodorant body spray" means a personal fragrance product with 20 percent or less fragrance that is designed for application all over the human body to provide a scent.
- VI.PP. "Device" means any instrument or contrivance (other than a firearm) that is designed for trapping, destroying, repelling, or mitigating any pest or any other form of plant or animal life (other than man and bacterium, virus, other microorganism on or in living man or other living animals). Device does not include equipment used for the application of pesticides when sold separately therefrom.

- VI.QQ. "Disinfectant" means a product labeled as a disinfectant or a product registered as a disinfectant under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA, 7 U.S.C. 136, et seq. (1996)) to destroy or irreversibly inactivate infectious or other undesirable bacteria, pathogenic fungi, or viruses on surfaces or inanimate objects. Disinfectant includes products labeled as both sanitizer and disinfectant. Disinfectant does not include products labeled solely for use on humans or animals; agricultural use; use in swimming pools, therapeutic tubs, or hot tubs; to be used on heat sensitive critical or semi-critical medical devices or medical equipment surfaces; to be applied to food-contact surfaces and are not required to be rinsed prior to contact with food; products which are pre-moistened wipes or towelettes sold exclusively to medical, convalescent, or veterinary establishments; or products labeled as bathroom and tile cleaners, glass cleaners, general purpose cleaners, toilet/urinal care products, metal polishes, carpet cleaners, or fabric refreshers that may also make disinfecting or anti-microbial claims on the label.
- VI.RR. "Distributor" means any person to whom a consumer product is sold or supplied for the purposes of resale or distribution in commerce, except that manufacturers, retailers, and consumers are not distributors.
- VI.SS. "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.
- VI.TT. "Dry cleaning fluid" means any non-aqueous liquid product designed and labeled exclusively for use on fabrics which are labeled "for dry clean only," such as clothing or drapery, or "S-coded" fabrics. S-coded fabric means an upholstery fabric designed to be cleaned only with water-free spot cleaning products as specified by the Joint Industry Fabric Standards Committee. Dry cleaning fluid does not include spot removers or carpet and upholstery cleaners.
- VI.UU. "Dusting aid" means a product designed 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.
- VI.VV. "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 labeled to clean the casings or housings of electrical equipment.
- VI.WW. "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 or energized electrical cleaners. Electronic cleaner does not include products 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 and clearly displaying "energized electronic equipment use only."

- VI.XX "Energized electrical cleaner" means a product labeled to clean and/or degrease electrical equipment, where cleaning and/or degreasing is accomplished when electrical current exists, or when there is a residual electrical potential from a component, such as a capacitor. Energized electrical cleaner does not include electronic cleaner.
- VI.YY. "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.
- VI.ZZ. "Fabric protectant" means a product 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 fibers. Fabric protectant does not include waterproofers; products labeled for use solely on leather; pigmented products that are designed 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 and qualify as either clear coating or vinyl/fabric/leather/polycarbonate coating.
- VI.AAA. "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 and upholstery cleaner, footwear or leather care product, spot remover, disinfectant, or products labeled for application to both fabric and human skin.
- VI.BBB. "Facial cleaner or soap" means a cleaner or soap designed primarily to clean the face and 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.
- VI.CCC. "Fat wood" means pieces of wood kindling with high naturally-occurring levels of sap or resin which enhance ignition of the kindling but does not include any kindling with substances added to enhance flammability, such as wax-covered or wax-impregnated wood-based products.
- VI.DDD. "Flea and tick insecticide" means any insecticide product that is designed for use against fleas, ticks, their larvae, or their eggs but does not include products that are designed to be used exclusively on humans or animals and their bedding.
- VI.EEE. "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.
- VI.FFF. "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 includes products for resilient flooring materials (including, but not limited to, asphalt, cork, linoleum, no-wax, rubber, seamless vinyl, vinyl composite flooring), non-resilient flooring materials (including, but not limited to, terrazzo, marble, slate, granite, brick, stone, ceramic tile, concrete), and wood floor wax (i.e., wax-based products for use solely on wood floors). Floor polish or wax does not include spray buff products, floor wax strippers, or products designed or labeled for unfinished wood floors or coatings subject to architectural coatings regulations.

- VI.GGG. "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.
- VI.HHH. "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.
- VI.III. "Flying bug insecticide" means any insecticide product that is designed for use against flying insects or other flying arthropods, including, but not limited to, flies, mosquitoes, moths, or gnats. Flying bug insecticide does not include wasp and hornet insecticide, products designed to be used exclusively on humans or, or products designed and labeled to protect fabrics from damage by moths where the label does not also indicate the product is suitable for use against flying insects or other flying arthropods.
- VI.JJJ. "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 or leather care product does not include fabric protectant, general purpose adhesive, contact adhesive, vinyl/fabric/leather/polycarbonate coating, rubber/vinyl protectant, fabric refresher, or products solely for deodorizing or sealant products with adhesive properties used to create external protective layers greater than 2 millimeters thick.
- VI.KKK. "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 millimeters of Mercury (mm Hg) at 20 degrees C, the sole purpose of which is to impart an odor or scent or to counteract a malodor.
- VI.LLL. "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 aids, wood cleaners, and products designed solely for the purpose of cleaning or products designed to leave a permanent finish such as stains, sanding sealers, and lacquers.
- VI.MMM. "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.
- VI.NNNN. "Gel" means a colloid in which the disperse phase has combined with the continuous phase to produce a semisolid material, such as jelly.
- VI.OOO. "General purpose adhesive" means any non-aerosol adhesive designed for use on a variety of substrates. General purpose adhesive does not include contact adhesives; construction, panel, and floor covering adhesives; adhesives designed exclusively for application on one specific category of substrates (i.e., substrates that are composed of similar materials, such as different types of metals, paper products, ceramics, plastics, rubbers, or vinyls); or adhesives designed exclusively for use on one specific category of articles (i.e., articles that may be composed of different materials but perform a specific function, such as gaskets, automotive trim, weatherstripping, or carpets). General purpose adhesive, does not include units of non-aerosol adhesive, less packaging, which weigh more than one pound and consists of more than 16 fluid ounces.

- VI.PPP. "General purpose cleaner" means a product labeled to clean a variety of hard surfaces, including, but 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.
- VI.QQQ. "General purpose degreaser" means 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, metal polish or cleanser, oven or grill cleaner, or products used exclusively in solvent cleaning tanks or related equipment (including, but not limited to, cold cleaners, vapor degreasers, conveyorized degreasers, film cleaning machines, products designed to clean miscellaneous metallic parts by immersion in a container) or products that are exclusively sold directly or through distributors to establishments which manufacture or construct goods or commodities and labeled exclusively for "use in the manufacturing process only."
- VI.RRR. "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 and 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.
- VI.SSS. "Glass cleaner" means a cleaning product designed primarily for cleaning surfaces made of glass. Glass cleaner does not include products designed solely for the purpose of cleaning optical materials used in eyeglasses, photographic equipment, scientific equipment, and photocopying machines.
- VI.TTT. "Graffiti remover" means a product labeled to remove spray paint, ink, marker, crayon, lipstick, nail polish, or shoe polish from a variety of non-cloth or nonfabric substrates and products labeled for dual use as both a paint stripper and graffiti remover. Graffiti remover does not include paint remover or stripper, nail polish remover, or spot remover.
- VI.UUU. "Hair mousse" means a hairstyling foam designed to facilitate styling of a coiffure and provide limited holding power.
- VI.VVV. "Hair shine" means any product designed for the primary purpose of creating a shine when applied to the hair and includes, but is not limited to, dual-use products designed primarily to impart a sheen to the hair. Hair shine does not include hair spray, hair mousse, hair styling product, hair styling gel, or products whose primary purpose is to condition or hold the hair.
- VI.WWW. "Hair spray" means a consumer product that is applied to styled hair and is designed or labeled to provide sufficient rigidity, to hold, retain, and/or finish the style of the hair for a period of time. Hair spray includes aerosol hair sprays, pump hair sprays, spray waxes; color, glitter, or sparkle hairsprays that make finishing claims; and products that are both a styling (i.e., forming, sculpting, or manipulating the hair for a period of time) and finishing (i.e., maintain and/or hold the styled hair for a period of time) product. Hair spray does not include spray products that are intended to aid in styling but do not provide finishing of a hairstyle.

- VI.XXX. "Hair styling product" means a consumer product designed or labeled for the 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, crème, 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 hairstyle, and leave-in volumizers, detanglers, and/or conditioners that make styling claims. Hair styling product does not include hair mousse, hair shine, hair spray, or shampoos and/or conditioners that are rinsed from the hair prior to styling.
- VI.YYY. "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.
- VI.ZZZ. "Herbicide" means a pesticide product designed to kill or retard a plant's growth, but excludes products that are for agricultural use or restricted materials that require a permit for use and possession.
- VI.AAAA. "High-temperature coating" means a high performance coating labeled and formulated for application to substrates exposed continuously or intermittently to temperatures above 204 degrees C (400 degrees F).
- VI.BBBB. "High volatility organic compound (HVOC)" means any volatile organic compound that exerts a vapor pressure greater than 80 mm Hg when measured at 20 degrees C.
- VI.CCC. "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.
- VI.DDDD. "Industrial maintenance coating" means a high performance architectural coating, including primers, sealers, undercoaters, intermediate coats, and topcoats, formulated for application to substrates, including floors, and exposed to one or more of the following extreme environmental conditions: immersion in water, wastewater, or chemical solutions (aqueous and non-aqueous solutions), or chronic exposures of interior surfaces to moisture condensation; acute or chronic exposure to corrosive, caustic, or acidic agents, or to chemicals, chemical fumes, or chemical mixtures or solutions; frequent exposure to temperatures above 121°C (250°F); frequent heavy abrasion, including mechanical wear and scrubbing with industrial solvents, cleansers, or scouring agents; or exterior exposure of metal structures and structural components. Industrial maintenance coatings must be labeled as specified in Part B, Section III.D.1.
- VI.EEEE. "Insecticide" means a pesticide product that is designed for use against insects or other arthropods. Insecticide does not include products that are for agricultural use, for a use which requires a structural pest control license, or restricted materials that require a permit for use and possession.
- VI.FFF. "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.

- VI.GGGG. "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 (e.g., government agencies, factories, schools, hospitals, restaurants, hotels, stores) that manufactures, transports, or sells goods or commodities or provides services for profit or is engaged in the nonprofit promotion of a particular public, educational, or charitable cause. 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.
- VI.HHHH. "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.
- VI.III. "Laundry prewash" means a product that is designed for application to a fabric prior to laundering and that supplements and contributes to the effectiveness of laundry detergents and/or provides specialized performance.
- VI.JJJJ. "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.
- VI.KKKK. "Lawn and garden insecticide" means an insecticide product labeled primarily to be used in household lawn and garden areas to protect plants from insects or other arthropods. Lawn and garden insecticides may claim to kill insects or other arthropods.
- VI.LLLL. "Liquid" means a substance or mixture of substances which is capable of a visually detectable flow as determined under ASTM D-4359-90(2000)e1 (2012) but does not include powders or other materials that are composed entirely of solid particles.
- VI.MMMM. "Lubricant" means a product designed to reduce friction, heat, noise, or wear between moving parts, or to loosen rusted or immovable parts or mechanisms. Lubricant does not include automotive power steering fluids; 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 exclusively sold directly or through distributors to establishments which manufacture or construct goods or commodities and labeled exclusively for "use in the manufacturing process only."
- VI.NNNN. "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.
- VI.OOOO. "LVP-VOC" means a chemical compound or mixture that contains at least one carbon atom and meets one of the following: has a vapor pressure less than 0.1 mm Hg at 20 degrees C, as determined by CARB Method 310 (December 31, 2018); 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; is a chemical compound with a boiling point greater than 216 degrees C, as determined by CARB Method 310 (December 31, 2018); or is the weight percent of a chemical mixture that boils above 216 degrees C, as determined by CARB Method 310 (December 31, 2018). Chemical compound means a molecule of definite chemical formula and isomeric structure. Chemical mixture means a substrate comprised of two or more chemical compounds.

- VI.PPP. "Manufacturer," for consumer product, means any person who imports, manufactures, assembles, produces, packages, repackages, or relabels a consumer product.
- VI.QQQ. "Medicated astringent/medicated toner" means any product regulated as a drug by the FDA which is applied to the skin for the purpose of cleaning or tightening pores and 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; cold cream; lotion; antiperspirants; or products that must be purchased with a doctor's prescription.
- VI.RRRR. "Medium volatility organic compound (MVOC)" means any volatile organic compound that exerts a vapor pressure greater than 2 mm Hg and less than or equal to 80 mm Hg when measured at 20 degrees C.
- VI.SSSS. "Metal polish/cleanser" means any product designed primarily to improve the appearance (e.g., remove or reduce stains, impurities, or oxidation from surfaces or to make surfaces smooth and shiny) of finished metal, metallic, or metallized surfaces by physical or chemical action and includes, but is not limited to, metal polishes used on brass, silver, chrome, copper, stainless steel, and other ornamental metals. Metal polish/cleanser does not include automotive wax, polish, sealant or glaze; wheel cleaner; paint remover or stripper; or products designed and labeled exclusively for automotive and marine detailing or products designed for use in degreasing tanks.
- VI.TTTT. "Mist spray adhesive" means any aerosol 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.
- VI.UUUU. "Multi-purpose dry lubricant" means any lubricant which is designed and labeled to provide lubricity by depositing a thin film of graphite, molybdenum disulfide (moly), or polytetrafluoroethylene or closely related fluoropolymer (Teflon) on surfaces and is designed for general purpose lubrication or for use in a wide variety of applications.
- VI.VVVV "Multi-purpose lubricant" means any lubricant designed for general purpose lubrication, or for use in a wide variety of applications. Multi-purpose lubricant does not include multi-purpose dry lubricants, penetrants, or silicone-based multi-purpose lubricants.
- VI.WWWW. "Multi-purpose solvent" means any liquid product designed or labeled to be used for dispersing, dissolving, or removing contaminants or other organic materials. Multipurpose solvent includes products that do not display specific use instructions on the product container or packaging; products that do not specify an end-use function or application on the product container or packaging; solvents used in institutional facilities, except for laboratory reagents used in analytical, educational, research, scientific or other laboratories; paint clean-up products (i.e., liquid product labeled for cleaning oil-based or water-based paint, lacquer, varnish, related coatings from, but not limited to, painting equipment or tools, plastics, or metals); and products labeled to prepare surfaces for painting. Multi-purpose solvent does not include solvents used in cold cleaners, vapor degreasers, conveyorized degreasers or film cleaning machines; solvents labeled exclusively for the clean-up of application equipment used for polyaspartic and polyurea coatings; solvents that are incorporated into, or used exclusively in the manufacture or construction of, the goods or commodities at the site of the establishment; products that are labeled exclusively to clean a specific contaminant, on a single substrate, in specific situations; or any product making any representation that the product may be used as or is suitable for use as a consumer product which qualifies under another definition.

- VI.XXXX. "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.
- VI.YYYY. "Nail polish remover" means a product designed to remove nail polish and coatings from fingernails or toenails.
- VI.ZZZZ. "Non-aerosol product" means any consumer product that is not dispensed by a pressurized spray system.
- VI.AAAAA. "Non-carbon containing compound" means any compound which does not contain any carbon atoms.
- VI.BBBBB. "Non-resilient flooring" means flooring of a mineral content which is not flexible and includes terrazzo, marble, slate, granite, brick, stone, ceramic tile, and concrete.
- VI.CCCC. "Non-selective terrestrial herbicide" means a terrestrial herbicide product that is toxic to plants without regard to species.
- VI.DDDDD. "Oven or grill cleaner" means a product labeled exclusively to remove baked on greases and/or deposits from food preparation and/or food cooking surfaces. A product that is labeled as an oven or grill cleaner that makes claims that it is suitable for degreasing other hard surfaces is a general purpose degreaser. A product that is labeled as an oven or grill cleaner that makes claims that it is suitable for cleaning other hard surfaces is a general purpose cleaner.
- VI.EEEE. "Paint" means any pigmented liquid, liquefiable, or mastic composition designed for application to a substrate in a thin layer which is converted to an opaque solid film after application and is used for protection, decoration, or identification or to serve some functional purpose such as the filling or concealing of surface irregularities or the modification of light and heat radiation characteristics.
- VI.FFFFF. "Paint remover or stripper" means any product designed to strip or remove paints or other related coatings, by chemical action, from a substrate without markedly affecting the substrate. Paint remover or stripper does not include multi-purpose solvents, paint brush cleaners, products designed and labeled exclusively as graffiti removers, and hand cleaner products that claim to remove paints and other related coatings from skin.
- "Paint thinner" means any liquid product that prominently displays the term paint VI.GGGGG. thinner, lacquer thinner, thinner, or reducer and used for reducing the viscosity of coating compositions or components. Paint thinner does not include artist's solvent/thinner; products that are sold in containers with a capacity of five (5) gallons or more and are labeled exclusively for the thinning of industrial maintenance coatings, zinc-rich primers, or high temperature coatings; and products labeled and used exclusively as an ingredient in a specific coating or coating brand line, whereby the coating would not be complete or useable without the specific ingredient. Paint thinner does not include a product with a principle display panel displaying language, in a font as large as or larger than the font size of the other words on the panel (not including the font size used for the company name, brand name, or logo), that the product is used exclusively for the thinning of industrial maintenance coatings, zinc-rich primers, or high temperature coatings and that makes no representation that the product is suitable for use or may be used for any other purpose except the thinning of industrial maintenance coatings, zinc-rich primers, or high temperature coatings.

- VI.HHHHH. "Penetrant" means a lubricant designed and labeled primarily to loosen metal parts that have bonded together due to rusting, oxidation, or other causes. Penetrant does not include multi-purpose lubricants that claim to have penetrating qualities but are not labeled primarily to loosen bonded parts.
- VI.IIII. "Personal fragrance product" means any product which is applied to the human body or clothing for the primary purpose of adding a scent or masking a malodor, including cologne, perfume, aftershave, and toilet water. Personal fragrance product does not include deodorant; medicated products designed primarily to alleviate fungal or bacterial growth on feet or other areas of the body; mouthwashes, breath fresheners and deodorizers; lotions, moisturizers, powders, or other skin care products used primarily to alleviate skin conditions such as dryness and irritations; products designed exclusively for use on human genitalia; soaps, shampoos, and products primarily used to clean the human body; and fragrance products designed to be used exclusively on non-human animals.
- VI.JJJJJ. "Pesticide" means and includes any substance or mixture of substances labeled, designed, or intended for use in preventing, destroying, repelling or mitigating any pest, or any substance or mixture of substances labeled, designed, or intended for use as a defoliant, desiccant, or plant regulator, provided that the term "pesticide" will not include any substance, mixture of substances, or device which the United States Environmental Protection Agency does not consider to be a pesticide.
- VI.KKKK. "Pressurized gas duster" means a pressurized product labeled to remove dust from a surface solely by means of mass air or gas flow, including surfaces such as photographs, photographic film negatives, computer keyboards, and other types of surfaces that cannot be cleaned with solvents. Pressurized gas duster does not include dusting aid.
- VI.LLLL. "Principal display panel or panels" means that part, or those parts of a label that are so designed as to most likely be displayed, presented, shown or examined under normal and customary conditions of display or purchase. Whenever a principal display panel appears more than once, all requirements pertaining to the principal display panel shall pertain to all such principal display panels.
- VI.MMMMM. "Product brand name" means the name of the product exactly as it appears on the principal display panel of the product.
- VI.NNNNN. "Product category" means the applicable category which best describes the product as listed in the definitions and Table 1.
- VI.OOOO. "Product form" means the applicable form that most accurately describes the product's dispensing form:

A = aerosol product

S = solid

P = pump spray

L = liquid

SS = semi-solid

O = other

- VI.PPPP. "Product line" means a group of products of identical form and function belonging to the same product category(ies).
- VI.QQQQ. "Propellant" means a liquefied or compressed gas that is used in whole or in part, such as a cosolvent, to expel a liquid or any other material from the same self-pressurized container or from a separate container.
- VI.RRRR. "Pump spray" means a packaging system in which the product ingredients within the container are not under pressure and in which the product is expelled only while a pumping action is applied to a button, trigger, or other actuator.
- VI.SSSS. "Responsible party" means the company, firm, or establishment which is listed on the product's label. If the label lists two companies, firms, or establishments, the responsible party is the party which the product was "manufactured for" or "distributed by," as noted on the label.
- VI.TTTT. "Retailer" means any person who sells, supplies, or offers consumer products for sale directly to consumers.
- VI.UUUU. "Retail outlet" means any establishment at which consumer products are sold, supplied, or offered for sale directly to consumers.
- VI.VVVV. "Roll-on product" means any antiperspirant or deodorant that dispenses active ingredients by rolling a wetted ball or wetted cylinder on the affected area.
- VI.WWWW. "Rubber/vinyl protectant" means any product labeled to protect, preserve or renew vinyl, or rubber on vehicles, tires, luggage, furniture, and/or household products such as vinyl covers, clothing, or accessories. Rubber/vinyl protectant does not include products labeled to clean the wheel rim, such as aluminum or magnesium wheel cleaners; tire cleaners that do not leave an appearance-enhancing or protective substance on the tire; pigmented products designed or labeled to be used primarily for coloring; products used for construction, reconstruction, modification, or structural maintenance or repair of rubber or vinyl substrates; or products, other than those labeled to be used on vehicle tires, qualifying as either clear coating or vinyl/fabric/leather/polycarbonate coating.
- VI.XXXXX. "Rubbing alcohol" means any product containing isopropyl alcohol (also called isopropanol) or denatured ethanol and labeled for topical use, usually to decrease germs in minor cuts and scrapes, to relieve minor muscle aches, as a rubefacient, and for massage.
- VI.YYYYY. "Sanitizer" means a product labeled as a sanitizer or a product registered as a sanitizer under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA, 7 U.S.C. 136, et seq.) to reduce, but not necessary eliminate, microorganisms in the air, on surfaces, or on inanimate objects. Products that are labeled both sanitizer and disinfectant are considered disinfectants. Sanitizer does not include disinfectant; products labeled solely for use on humans or animals; products labeled solely for agricultural use; products labeled solely for use in swimming, therapeutic tubs, or hot tubs; products which are labeled to be used on heat sensitive critical or semi-critical medical devices or medical equipment surfaces; products which are pre-moistened wipes or towelettes sold exclusively to medical, convalescent or veterinary establishments; products which are labeled to be applied to food-contact surfaces and are not required to be rinsed prior to contact with food; or other products labeled bathroom and tile cleaners, glass cleaners, general purpose cleaners, toilet/urinal care products, metal polishers, carpet cleaners, or fabric refreshers that may also make sanitizing or anti-microbial claims on the label.

- VI.ZZZZ. "Sealant and caulking compound" means any product with adhesive properties that is designed to fill, seal, waterproof, or weatherproof gaps or joints between two surfaces. Sealant and caulking compound does not include roof cements and roof sealants; insulating foams; removable caulking compounds (i.e., provides a three to six month temporary seal); clear/paintable/water resistant caulking compounds (i.e., contains no appreciable level of opaque fillers or pigments, transmits most or all visible light when cured, and is immediately resistant to precipitation upon application); floor seam sealers; products designed exclusively for automotive uses; sealers that are applied as continuous coatings; or units of product, less packaging, which weigh more than one pound and consist of more than 16 fluid ounces.
- VI.AAAAAA. "Semi-solid" means a product that, at room temperature, will not pour, but will spread or deform easily, including but not limited to gels, pastes, and greases.
- VI.BBBBB. "Shaving cream" means an aerosol product which dispenses a foam lather intended to be used with a blade, cartridge razor, or other wet-shaving system in the removal of facial or other bodily hair. Shaving cream does not include shaving gel.
- VI.CCCCC. "Shaving gel" means an aerosol product which dispenses a post-foaming semisolid designed to be used with a blade, cartridge razor, or other shaving system in the removal of facial or other bodily hair. Shaving gel does not include shaving cream.
- VI.DDDDD. "Silicone-based multi-purpose lubricant" means any lubricant that is designed and labeled to provide lubricity primarily through the use of silicone compounds including, but not limited to, polydimethylsiloxane and is designed and labeled for general purpose lubrication or for use in a wide variety of applications. Silicone-based multi-purpose lubricant does not include products designed and labeled exclusively to release manufactured products from molds.
- VI.EEEEEE. "Single phase aerosol air freshener" means an aerosol air freshener with the liquid contents in a single homogeneous phase and which does not require that the product container be shaken before use.
- VI.FFFFF. "Solid" means a substance or mixture of substances which, either whole or subdivided (such as the particles comprising a powder), is not capable of visually detectable flow as determined under ASTM D-4359-90(2000)e1 (2012).
- VI.GGGGG. "Special purpose spray adhesive" means an aerosol adhesive that meets any of the following definitions:
  - VI.GGGGG.1. Mounting adhesive: designed to permanently mount photographs, artwork, and any other drawn or printed media to a backing (e.g., paper, board, cloth) without causing discoloration to the artwork.
  - VI.GGGGG.2. Flexible vinyl adhesive: designed 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, such as a high boiling point organic solvent, that is incorporated into a plastic to increase its flexibility, workability, or distensibility, and may be determined using ASTM Method E260-91 (2011) or from product formulation data.
  - VI.GGGGG.3. Polystyrene foam adhesive: designed to bond polystyrene foam to substrates.

- VI.GGGGG.4. Automobile headliner adhesive: designed to bond together layers in motor vehicle headliners.
- VI.GGGGGG.5. Polyolefin adhesive: designed to bond polyolefins to substrates.
- VI.GGGGG.6. Laminate repair/edgebanding adhesive: designed for the touch-up or repair (e.g., lifted edges, delaminations) of items laminated with high pressure laminates (i.e., temperatures exceeding 265°F and pressures between 1,000 and 1,400 psi) or for the touch-up, repair, or attachment of edgebanding materials, including but not limited to, other laminates, synthetic marble, veneers, wood molding, and decorative metals.
- VI.GGGGG.7. Automotive engine compartment adhesive: designed 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°F.
- VI.HHHHHH. "Spot remover" means any product labeled to clean localized areas, or remove localized spots or stains on cloth or fabric such as drapes, carpets, upholstery, and clothing that does not require subsequent laundering to achieve stain removal. Spot remover does not include dry cleaning fluid, laundry prewash, or multi-purpose solvent.
- VI.IIIII. "Spray buff product" means a product designed to restore a worn floor finish in conjunction with a floor buffing machine and special pad.
- VI.JJJJJJ. "Table B compound" means any carbon-containing compound listed as an exception to the definition of VOC.
- VI.KKKKK. "Temporary hair color" means any product that applies color, glitter, or UV-active pigments to hair, wigs, or fur and is removable when washed. Temporary hair color includes hair color mousses and products labeled to add texture or thickness to cover thinning/balding areas. Temporary hair color does not include hair spray, hair styling product, or hair mousse.
- VI.LLLLL. "Thermoplastic rubber coating and mastic" means a coating or mastic formulated and recommended for application to roofing or other structural surfaces and that incorporates no less than 40 percent by weight of thermoplastic rubbers in the total resin solids and may also contain other ingredients including, but not limited to, fillers, pigments, and modifying resins.
- VI.MMMMMM. "Tire sealant and inflation" means any pressurized product that is designed to temporarily inflate and seal a leaking tire.
- VI.NNNNNN. "Toilet/urinal care product" means any product designed or labeled to clean and/or to deodorize toilet bowls, toilet tanks, or urinals connected to permanent plumbing in buildings and other structures, portable toilets or urinals placed at temporary or remote locations, and toilet or urinals in vehicles such as buses, recreational motor homes, boats, ships, and aircraft. Toilet/urinal care product does not include bathroom and tile cleaner or general purpose cleaner.
- VI.OOOOO. "Type A propellant" means a compressed gas such as CO2, N2, N2O, or compressed air which is used as a propellant and is either incorporated with the product or contained in a separate chamber within the product's packaging.

- VI.PPPPP. "Type B propellant" means any halocarbon which is used as a propellant including chlorofluorocarbons (CFCs), hydrochlorofluorocarbons (HCFCs), and hydrofluorocarbons (HFCs).
- VI.QQQQQ. "Type C propellant" means any propellant which is not a Type A or Type B propellant, including propane, isobutane, n-butane, and dimethyl ether (also known as dimethyl oxide).
- VI.RRRRR. "Undercoating" means any aerosol product designed to impart a protective, non-paint layer to the undercarriage, trunk interior, and/or firewall of motor vehicles to prevent the formation of rust or to deaden sound and includes, but is not limited to, rubberized, mastic, or asphaltic products.
- VI.SSSSS. "Usage directions" means the text or graphics on the product label or accompanying literature that describes to the end user how and in what quantity the product is to be used.
- VI.TTTTT. "Vinyl/fabric/leather/polycarbonate coating" means a coating designed and labeled exclusively to coat vinyl, fabric, leather, or polycarbonate substrates.
- VI.UUUUUU. "Wasp and 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.
- VI.VVVVV. "Waterproofer" means a product designed and labeled exclusively to repel water from fabric or leather substrates. Waterproofer does not include fabric protectants.
- VI.WWWWW."Wax" means a material or synthetic thermoplastic substance generally of high molecular weight hydrocarbons or high molecular weight esters of fatty acids or alcohols, except glycerol and high polymers (plastics) and includes, but is not limited to, substances derived from the secretions of plants and animals such as carnuba wax and beeswax, substances of a mineral origin such as ozocerite and paraffin, and synthetic polymers such as polyethylene.
- VI.XXXXXX. "Web spray adhesive" means any aerosol adhesive that is not a mist spray adhesive or special purpose spray adhesive.
- VI.YYYYYY. "Wood cleaner" means a product labeled to clean wooden materials and includes, but is not limited to, decking, fences, flooring, logs, cabinetry, and furniture. Wood cleaner does not include dusting aid, general purpose cleaner, furniture maintenance product, floor wax stripper, floor polish or wax, or products designed and labeled exclusively to preserve or color wood.
- VI.ZZZZZZ. "Wood floor wax" means wax-based products for use solely on wood floors.
- VI.AAAAAAA. "Zinc-rich primer" means a coating that contains at least 65 percent metallic zinc powder or zinc dust by weight of total solids and is formulated for application to metal substrates to provide a firm bond between the substrate and subsequent applications of coatings. Zinc-rich primers must be labeled in accordance with Part B, Section III.D.10.

#### PART B CONCERNING ARCHITECTURAL AND INDUSTRIAL MAINTENANCE COATINGS

## Applicability

- I.A. This part applies to any person who supplies, sells, offers for sale, or manufacturers any architectural or industrial maintenance coating and any person who applies or solicits the application of any architectural or industrial maintenance coating in
  - I.A.1. The 8-hour Ozone Control Area.
  - I.A.2. (State Only) Colorado. As marked by (State Only), the requirements are not federally enforceable.
- I.B. This part does not apply to
  - I.B.1. Any architectural or industrial maintenance coating that is sold, supplied, offered for sale, or manufactured for use outside Colorado or shipped to other manufacturers for reformulation or repackaging.
  - I.B.2. Any aerosol coating product.
  - I.B.3. Any architectural or industrial maintenance coating that is sold in a container with a volume of one liter (1.057 quart) or less, including kits containing containers of different colors, types, or categories of coatings and two component products. This exemption includes multiple containers or one liter or less that are packaged and shipped together with no intent or requirement to ultimately sell as one unit. This exemption does not include bundling of containers one liter or less that are sold together as a unit or any type of marketing that implies that multiple containers one liter or less be combined into one container. This exemption does not include packaging from which the coating cannot be applied.

### II. Standards

- II.A. On or after May 1, 2020, no person can manufacture or blend for sale in Colorado any architectural or industrial maintenance coating with a VOC content in excess of the VOC limit specified in Table 1.
- II.B. No person can supply, sell, offer for sale, repackage for sale, apply, or solicit for application in Colorado any architectural or industrial maintenance coating that is manufactured or blended on or after May 1, 2020, with a VOC content in excess of the VOC limit specified in Table 1.
- II.C. If an architectural or industrial maintenance coating is recommended for use for more than one of the coating categories listed in Table 1, then the most restrictive VOC content limit shall apply. This provision does not apply to the following coating categories
  - II.C.1. Aluminum roof coatings.
  - II.C.2. Bituminous roof primers.
  - II.C.3. High temperature coatings.
  - II.C.4. Industrial maintenance coatings.

- II.C.5. Low-solids coatings.
- II.C.6. Metallic pigmented coatings.
- II.C.7. Pretreatment wash primers.
- II.C.8. Shellacs.
- II.C.9. Specialty primers, sealers, and undercoaters.
- II.C.10. Wood coatings.
- II.C.11. Wood preservatives.
- II.C.12. Zinc-rich primers.
- II.C.13. Calcimine recoaters.
- II.C.14. Impacted immersion coatings.
- II.C.15. Nuclear coatings.
- II.C.16. Thermoplastic rubber coatings and mastic.
- II.C.17. Concrete surface retarders.
- II.D. For any architectural or industrial maintenance coating that is not identified in Table 1, the VOC content limit will be determined by classifying the coating as a flat coating, nonflat coating, or nonflat-high gloss coating and the corresponding coating limit of Table 1 applies.
- II.E. No person who applies or solicits the application of any architectural or industrial maintenance coating can apply the coating if additional solvent has been added to thin the coating such that the addition causes the coating to exceed the applicable VOC limit specified in Table 1.
- II.F. Containers of architectural and industrial maintenance coatings that are applied directly to a surface from the container by pouring, siphoning, brushing, rolling, padding, ragging, or other means must be closed when not in use. These containers include, but are not limited to, drums, buckets, cans, pails, trays, or other application containers. Containers of any VOC-containing materials used for thinning and cleanup must also be closed when not in use.

Table 1 – VOC content limits for architectural and industrial maintenance coatings manufactured on or after May 1, 2020	
Coating category	VOC content limit (grams per liter)*
Flat coatings	50
Nonflat coatings	100
Nonflat – high gloss coatings	150
Specialty coatings	
* Aluminum roof	450

* Basement specialty coatings	400
* Bituminous roof coating	270
* Bituminous roof primers	350
* Bond breakers	350
* Calcimine recoaters	475
Concrete curing compounds	350
Concrete/masonry sealer	100
Concrete surface retarders	780
Conjugated oil varnishes	450
Conversion varnish	725
Driveway sealers	50
Dry fog coatings	150
Faux finishing coatings	350
Fire-resistive coatings	350
Floor coatings	100
Form-release compounds	250
Graphic arts coating (sign paints)	500
High temperature coatings	420
Impacted immersion coatings	780
Industrial maintenance coatings	250
Low-solids coatings	120
Magnesite cement coatings	450
Mastic texture coatings	100
Metallic pigmented coatings	500
Multi-color coating	250
Nuclear coatings	450
Pre-treatment wash primers	420
Primers, sealers, and undercoaters	100
Reactive penetrating sealer	350
Reactive penetrating carbonate stone sealer	500
Recycled coatings	250
Roof coatings	250
Rust preventative coatings	250
Shellacs	
* Clear	730

* Opaque	550
Specialty primers, sealers, and undercoaters	100
Stains	250
Stone consolidant	450
Swimming pool coatings	340
Thermoplastic rubber coatings and mastics	550
Traffic marking coatings	100
Tub and tile refinish	420
Waterproofing membranes	250
Wood coatings	275
Wood preservatives	350
Zinc-rich primer	340

<sup>\*</sup> Limits are expressed as VOC content, as determined in accordance with Section V., thinned to the manufacturer's maximum thinning recommendation, excluding any colorant added to tint bases.

## III. Container labeling

- III.A. The manufacturer of any architectural or industrial maintenance coating subject to a VOC limit in Table 1 must clearly display on the container label, lid, or bottom such that it is readily observable without dissembling the container or package the date the coating was manufactured or a date code representing the date of manufacture. The date or date code must be displayed on the product such that it is readily observable without removing or disassembling any portion of the product container or packaging.
- III.B. The manufacturer of any architectural or industrial maintenance coating must clearly display on the container label or lid a statement of the manufacturer's recommendation regarding thinning of the coating. This requirement does not apply to the thinning of coatings with water. If thinning is not necessary prior to use, the recommendation must specify that the coating is to be applied without thinning.
- III.C. The manufacturer of any architectural or industrial maintenance coating must clearly display on the container label, lid, or bottom the VOC content in grams per liter of coating. If the manufacturer recommends thinning, the container must display the VOC content including the maximum amount of thinning solvent recommended by the manufacturer. If the coating is a multi-component product, the container must display the VOC content as mixed or catalyzed. If the coating contains silanes, siloxanes, or other ingredient that generate ethanol or other VOCs during the curing process, the VOC content must include the VOCs emitted during curing.
- III.D. The manufacturer must clearly display on the container label
  - III.D.1. For any industrial maintenance coating, at least one of the following statements
    - III.D.1.a. "For industrial use only"
    - III.D.1.b. "For professional use only"

- III.D.1.c. "Not for residential use" or "Not intended for residential use"
- III.D.2. For any specialty primer, sealer, or undercoating, at least one of the following statements
  - III.D.2.a. "For blocking stains"
  - III.D.2.b. "For fire-damaged substrates"
  - III.D.2.c. "For smoke-damaged substrates"
  - III.D.2.d. "For water-damaged substrates"
- III.D.3. For any clear topcoat faux finishing coating, "This product can only be sold or used as part of a faux finishing coating system."
- III.D.4. For any clear brushing lacquer, "For brush application only" and "This product must not be thinned or sprayed."
- III.D.5. For any non-flat high-gloss coating, "High gloss."
- III.D.6. For any rust preventative coating, "For metal substrates only."
- III.D.7. For any reactive penetrating sealer, "Reactive penetrating sealer."
- III.D.8. For any stone consolidant, "Stone consolidant for professional use only."
- III.D.9. For any wood coating, "For wood substrates only."
- III.D.10. For any zinc-rich primer, at least one of the following statements
  - III.D.10.a. "For industrial use only"
  - III.D.10.b. "For professional use only"
  - III.D.10.c. "Not for residential use" or "Not intended for residential use"

# IV. Reporting

- IV.A. Within 180 days of written notice, the Division may require a manufacturer to report any of the following information for any architectural or industrial maintenance coating subject to a VOC limit in Table 1
  - IV.A.1. The name and mailing address of the manufacturer.
  - IV.A.2. The name, address, and telephone number of a contact person.
  - IV.A.3. The name of the coating product as it appears on the label and the application coating category.
  - IV.A.4. Whether the product is marketed for interior or exterior use or both.
  - IV.A.5. Whether the product is marketed as solvent-borne, waterborne, or 100% solids.
  - IV.A.6. Whether the coating is a single-component or multi-component product.

- IV.A.7. The description of resin or binder in the product.
- IV.A.8. The number of gallons sold in Colorado in containers greater than one liter (1.057 quart) and in containers equal to or less than one liter (1.057 quart).
- IV.A.9. The VOC content in grams per liter as determined in accordance with Section V. If thinning is recommended, the VOC content after maximum recommended thinning. If containers less than one liter have a different VOC content than containers greater than one liter, list separately. If the coating is a multi-component product, provide the VOC Content as mixed or catalyzed.
- IV.A.10. The names and CAS numbers of the VOC constituents in the product.
- IV.A.11. The names and CAS numbers of the VOC constituents in the product that are exempted from the definition of VOC.
- IV.A.12. The density of the product in pounds per gallon.
- IV.A.13. The percent by weight of solids, all volatile materials, water, and any compounds in the product that are exempted from the definition of VOC.
- IV.A.14. The percent by volume of solids, water, and any compounds in the product that are exempted from the definition of VOC.
- IV.A.15. Documentation explaining the date portion of the date code indicating the date of manufacture.

#### V. Test methods

- V.A. Manufacturers of architectural or industrial maintenance coatings must possess documentation that such coating complies with the VOC content limits in Table 1.
  - V.A.1. The VOC content of a coating will be determined as follows
    - V.A.1.a. For coatings that are low solids coatings

VOC content = (Ws - Ww - Wec)/Vm

Where:

VOC content = grams of VOC per liter of coating (must include the maximum amount of thinning solvent recommended by the manufacturer)

Ws = weight of volatiles in grams

Ww = weight of water in grams

Wec = weight of exempt compounds in grams

Vm = volume of coating in liters

V.A.1.b. For coatings that are not low solids coatings

VOC content = (Ws - Ww - Wec)/(Vm - Vw - Vec)

Where:

VOC content = grams of VOC per liter of coating (must include the maximum amount of thinning solvent recommended by the manufacturer)

Ws = weight of volatiles in grams

Ww = weight of water in grams

Wec = weight of exempt compounds in grams

Vm = volume of coating in liters

Vw = volume of water in liters

Vec = volume of exempt compounds in liters

- V.A.1.b.(i) The VOC content of multi-component products must be calculated as mixed or catalyzed.
- V.A.1.b.(ii) The VOC content of coatings containing silanes, siloxanes, or other ingredients that generate ethanol or other VOCs during the curing process must include the VOCs emitting during curing.
- V.A.1.c. The VOC content of a tint base must be determined without colorant that is added after the tint base is manufactured.
- V.A.2. The physical properties of a coating must be determined using EPA Method 24 (40 CFR Part 60, Appendix A) (February 27, 2014) or SCAQMD Method 303-91 "Determination of Exempt Compounds" (revised 1993).
- V.A.3. The exempt compounds content of a coating must be determined using ASTM D 3960-05 "Standard Practice for Determining Volatile Organic Compound (VOC) Content of Paints and Related Coatings" (2018), SCAQMD Method 303-91 "Determination of Exempt Compounds" (revised 1993), BAAQMD Method 43 "Determination of Volatile Methylsiloxanes in Solvent-Based Coatings, Inks, and Related Materials" (adopted 1996) or BAAQMD Method 41 "Determination of Volatile Organic Compounds in Solvent-Based Coatings and Related Materials Containing Parachlorobenzotrifluoride" (adopted 1995).
- V.A.4. The VOC content of a coating must be determined using EPA Method 24 (40 CFR Part 60, Appendix A) (February 27, 2014), formulation data, or any other reasonable means for predicting that the coating has been formulated as intended (e.g., quality assurance checks, recordkeeping). If there are inconsistencies between EPA Method 24 results and other means for determining VOC content, the Method 24 results will govern.
- V.A.5. The analysis of methacrylate multicomponent coatings used as traffic marking coatings will be conducted according to a modification of EPA Method 24 "Determination of Volatile Matter Content of Methacrylate Multicomponent Coatings Used as Traffic Marking Coatings" (40 CFR 59, subpart D, Appendix A) (September 11, 1998).

### VI. Definitions

- VI.A. "8-Hour Ozone Control Area" means the Counties of Adams, Arapahoe, Boulder (includes part of Rocky Mountain National Park), Douglas, and Jefferson; the Cities and Counties of Denver and Broomfield; and the following portions of the Counties of Larimer and Weld:
  - VI.A.1. For Larimer County (includes part of Rocky Mountain National Park), that portion of the county that lies south of a line described as follows: Beginning at a point on Larimer County's eastern boundary and Weld County's western boundary intersected by 40 degrees, 42 minutes, and 47.1 seconds north latitude, proceed west to a point defined by the intersection of 40 degrees, 42 minutes, 47.1 seconds north latitude and 105 degrees, 29 minutes, and 40.0 seconds west longitude, thence proceed south on 105 degrees, 29 minutes, 40.0 seconds west longitude to the intersection with 40 degrees, 33 minutes and 17.4 seconds north latitude, thence proceed west on 40 degrees, 33 minutes, 17.4 seconds north latitude until this line intersects Larimer County's western boundary and Grand County's eastern boundary.
  - VI.A.2. For Weld County, that portion of the county that lies south of a line described as follows: Beginning at a point on Weld County's eastern boundary and Logan County's western boundary intersected by 40 degrees, 42 minutes, 47.1 seconds north latitude, proceed west on 40 degrees, 42 minutes, 47.1 seconds north latitude until this line intersects Weld County's western boundary and Larimer County's eastern boundary.
- VI.B. "Adhesive" means any chemical substance that is applied for the purpose of bonding two surfaces together other than by mechanical means.
- VI.C. "Aerosol coating product" means a pressurized coating product containing pigments or resins that dispenses product ingredients by means of a propellant, and is packaged in a disposable can for hand-held application, or for use in specialized equipment for ground traffic/marking applications.
- VI.D. "Aluminum roof coating" means a coating labeled and formulated exclusively for application to roofs and containing at least 84 grams of elemental aluminum pigment per liter of coating (at least 0.7 pounds per gallon). Pigment content shall be determined in accordance with SCAQMD Method 318-95 "Determination of Weight Percent Elemental Metal in Coatings by X-Ray Diffraction" (July 1996).
- VI.E. "Appurtenance" means any accessory to a stationary structure coated at the site of installation, whether installed or detached, including but not limited to: bathroom and kitchen fixtures; cabinets; concrete forms; doors; elevators; fences; hand railings; heating equipment, air conditioning equipment, and other fixed mechanical equipment or stationary tools; lampposts; partitions; pipes and piping systems; rain gutters and downspouts; stairways; fixed ladders; catwalks and fire escapes; and window screens.
- VI.F. "Architectural coating" means a coating to be applied to stationary structures or their appurtenances at the site of installation, to portable buildings at the site of installation, to pavements, or to curbs. Architectural coating does not include coatings applied in shop applications or to non-stationary structures such as airplanes, ships, boats, railcars, and automobiles, as well as adhesives.

- VI.G. "Basement specialty coating" means a clear or opaque coating that is labeled and formulated for application to concrete and masonry surfaces to provide a hydrostatic seal for basements and other below-grade surfaces. Basement specialty coatings must be capable of withstanding at least 10 psi of hydrostatic pressure as determined in accordance with ASTM D7088-04 "Standard Practice for Resistance to Hydrostatic Pressure for Coatings Used in Below Grade Applications Applied to Masonry" (2017) and must be resistant to mold and mildew growth and must achieve a microbial growth rating of 8 or more as determined in accordance with ASTM D3273-00 "Standard Test Method for Resistance to Growth of Mold on the Surface of Interior Coatings in an Environmental Chamber" (2016) and ASTM D3274-95 "Standard Test Method for Evaluating Degree of Surface Disfigurement of Paint Films by Microbial (Fungal or Algal) Growth or Soil and Dirt Accumulation" (2017).
- VI.H. "Bitumens" means black or brown materials including, but not limited to, asphalt, tar, pitch, and asphaltite that are soluble in carbon disulfide, consist mainly of hydrocarbons, and are obtained from natural deposits or as residues from the distillation of crude petroleum or coal.
- VI.I. "Bituminous roof coating" means a coating which incorporates bitumens that is labeled and formulated exclusively for roofing for the primary purpose of preventing water penetration.
- VI.J. "Bituminous roof primer" means a primer which incorporates bitumens that is labeled and formulated exclusively for roofing and intended for the purpose of preparing a weathered or aged surface or improving the adhesion of subsequent surfacing components.
- VI.K. "Bond breaker" means a coating labeled and formulated for application between layers of concrete to prevent a freshly poured top layer of concrete from bonding to the layer over which it is poured.
- VI.L. "Calcimine recoaters" means a flat solvent borne coating formulated and recommended specifically for recoating calcimine-painted ceilings and other calcimine-painted substrates.
- VI.M. "Coating" means a material applied onto or impregnated into a substrate for protective, decorative, or functional purposes. Such materials include, but are not limited to, paints, varnishes, sealers, and stains.
- VI.N. "Colorant" means a concentrated pigment dispersion in water, solvent, and/or binder that is added to an architectural coating after packaging in sale units to produce the desired color.
- VI.O. "Concrete curing compound" means a coating labeled and formulated for application to freshly poured concrete to retard the evaporation of water or harden or dustproof the surface of freshly poured concrete.
- VI.P. "Concrete/masonry sealer" means a clear or opaque coating that is labeled and formulated primarily for application to concrete and masonry surfaces to prevent penetration of water; provide resistance against abrasion, alkalis, acids, mildew, staining, or ultraviolet light; or harden or dustproof the surface of aged or cured concrete.

- VI.Q. "Concrete surface retarders" means a mixture of retarding ingredients such as extender pigments, primary pigments, resin, and solvent that interact chemically with the cement to prevent hardening on the surface where the retarder is applied, allowing the retarded mix of cement and sand at the surface to be washed away to create an exposed aggregate finish.
- VI.R. "Conjugated oil varnish" means a clear or semi-transparent wood coating, labeled as such, excluding lacquers or shellacs, based on a natural occurring conjugated vegetable oil (Tung oil) and modified with other natural or synthetic resins; a minimum of fifty percent of the resin solids consisting of conjugated oil. Supplied as a single component product, conjugated oil varnishes penetrate and seal the wood. Film formation is due to polymerization of the oil. These varnishes may contain small amounts of pigment to control the final gloss or sheen.
- VI.S. "Conversion varnish" means a clear acid curing coating with an alkyd or other resin blended with amino resins and supplied as a single component or two component product. Conversion varnishes produce a hard, durable, clear finish designed for professional application to wood flooring. This film formation is the result of an acid-catalyzed condensation reaction, affecting transetherification at the reactive ethers of the amino resins.
- VI.T. "Driveway sealer" means a coating labeled and formulated for application to worn asphalt driveway surfaces to fill cracks, seal the surface to provide protection, or restore or preserve the appearance.
- VI.U. "Dry fog coating" means a coating labeled and formulated only for spray application such that overspray droplets dry before subsequent contact with incidental surfaces in the vicinity of the surface coating activity.
- VI.V. "Faux finishing coating" means a coating labeled and formulated to create artistic effects including, but not limited to, dirt, old age, smoke damage, and simulated marble and wood grain; a metallic, iridescent, or pearlescent appearance that contains at least 48 grams of pearlescent mica pigment or other iridescent pigment per liter of coating as applied (at least 0.4 pounds per gallon); a metallic appearance that contains greater than 48 grams of elemental metallic pigment (determined in accordance with SCAQMD Method 318-95 "Determination of Weight Percent Elemental Metal in Coatings by X-Ray Diffraction" (July 1996)) per liter of coating as applied (0.4 pounds per gallon) and which requires a clear topcoat to prevent the degradation of the finish under normal use conditions; or a clear topcoat to seal and protect a faux finishing coating. These clear topcoats must be sold and used solely as part of a faux finishing coating system.
- VI.W. "Fire-resistive coating" means a coating labeled and formulated to protect the structural integrity by increasing the fire endurance of interior or exterior steel and other structural materials and includes sprayed fire resistive materials and intumescent fire resistive coatings that are used to bring structural materials into compliance with federal, state, and local building code requirements. The fire-resistive coating must be tested in accordance with ASTM Designation E 119-08 "Standard Test Methods for Fire Tests of Building Construction and Materials" (2018).
- VI.X. "Flat coating" means a coating that is not defined under any other definition in this rule and that registers gloss less than 15 on an 85-degree meter or less than five on a 60-degree meter according to ASTM D 523-89 "Standard Test Method for Specular Gloss" (1999).

- VI.Y. "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.
- VI.Z. "Form-release compound" means a coating labeled and formulated for application to a concrete form to prevent the freshly poured concrete from bonding to the form. The form may consist of wood, metal, or some material other than concrete.
- VI.AA. "Graphic arts coating or sign paint" means a coating labeled and formulated for hand application by artists using brush, airbrush or roller techniques to indoor and outdoor signs (excluding structural components) and murals including letter enamels, poster colors, copy blockers, and bulletin enamels.
- VI.BB. "High-temperature coating" means a high performance coating labeled and formulated for application to substrates exposed continuously or intermittently to temperatures above 204 degrees C (400 degrees F).
- VI.CC. "Impacted immersion coating" means a high performance maintenance coating formulated and recommended for application to steel structures subject to immersion in turbulent, debris-laden water.
- VI.DD. "Industrial maintenance coating" means a high performance architectural coating, including primers, sealers, undercoaters, intermediate coats, and topcoats, formulated for application to substrates, including floors, and exposed to one or more of the following extreme environmental conditions: immersion in water, wastewater, or chemical solutions (aqueous and non-aqueous solutions), or chronic exposures of interior surfaces to moisture condensation; acute or chronic exposure to corrosive, caustic, or acidic agents, or to chemicals, chemical fumes, or chemical mixtures or solutions; frequent exposure to temperatures above 121°C (250°F); frequent heavy abrasion, including mechanical wear and scrubbing with industrial solvents, cleansers, or scouring agents; or exterior exposure of metal structures and structural components. Industrial maintenance coatings must be labeled as specified in Part B, Section III. D.1.
- VI.EE. "Low-solids coating" means a coating containing 0.12 kilogram or less of solids per liter (1 pound or less of solids per gallon) of coating material as recommended for application by the manufacturer.
- VI.FF. "Magnesite cement coating" means a coating labeled and formulated for application to magnesite cement decking to protect the magnesite cement substrate from erosion by water.
- VI.GG. "Manufacturer's maximum thinning recommendation" means the maximum recommendation for thinning that is indicated on the label or lid of the coating container.
- VI.HH. "Mastic texture coating" means a coating labeled and formulated to cover holes and minor cracks and to conceal surface irregularities, and is applied in a single coat of at least 10 mils (0.010 inch) dry film thickness.
- VI.II. "Medium density fiberboard (MDF)" means a composite wood product, panel, molding, or other building material composed of cellulosic fibers made by dry forming and pressing of resonated fiber mat.

- VI.JJ. "Metallic pigmented coating" means a coating that is labeled and formulated to provide a metallic appearance. Metallic pigmented coatings must contain containing at least 48 grams of elemental metallic pigment (excluding zinc) per liter of coating as applied (at least 0.4 pounds per gallon), when tested in accordance with SCAQMD Method 318-95 "Determination of Weight Percent Elemental Metal in Coatings by X-Ray Diffraction" (July 1996). The Metallic pigmented coating category does not include coatings applied to roofs or zinc rich primers.
- VI.KK. "Multi-color coating" means a coating that is packaged in a single container and that is labeled and formulated to exhibits more than one color when applied in a single coat.
- VI.LL. "Non-flat coating" means a coating that is not defined under any other definition in this rule and that registers a gloss of 15 or greater on an 85-degree meter and 5 or greater on a 60-degree meter according to ASTM Designation D 523-89 "Standard Test Method for Specular Gloss" (1999).
- VI.MM. "Non-flat high gloss coating" means a non-flat coating that registers a gloss of 70 or greater on a 60-degree meter according to ASTM Designation D 523-89 "Standard Test Method for Specular Gloss" (1999).
- VI.NN. "Nuclear coating" means a protective coating formulated and recommended to seal porous surfaces such as steel or concrete that otherwise would be subject to intrusion by radioactive materials. These coatings must be resistant to long term (service life) cumulative radiation exposure according to ASTM Method 4082-02 "Standard Test Method for Effects of Gamma Radiation on Coatings for Use in Light-Water Nuclear Power Plants" (2017), relatively easy to decontaminate, and resistant to various chemicals to which the coatings are likely to be exposed according to ASTM Method D 3912-95 "Standard Test Method for Chemical Resistance of Coatings Used in Light-Water Nuclear Power Plants" (2001).
- VI.OO. "Particleboard" means a composite wood product panel, molding, or other building material composed of cellulosic material in the form of discrete particles, as distinguished from fibers, flakes, or strands, which are pressed together with resin.
- VI.PP. "Pearlescent" means exhibiting various colors depending on the angles of illumination and viewing, as observed in mother-of-pearl.
- VI.QQ. "Plywood" means a panel product consisting of layers of wood veneers or composite core pressed together with resin.
- VI.RR. "Post-consumer coating" means a finished coating that would have been disposed of in a landfill, having completed its usefulness to a consumer, and does not include manufacturing wastes.
- VI.SS. "Pre-treatment wash primer" means a primer that contains a minimum of 0.5 percent acid, by weight, when tested in accordance with ASTM D 1613-06 "Standard Test Method for Acidity in Volatile Solvents and Chemical Intermediates Used in Paint, Varnish, Lacquer and Related Products" (2017), that is labeled and formulated for application directly to bare metal surfaces to provide corrosion resistance and to promote adhesion of subsequent topcoats.

- VI.TT. "Primer, sealer, and undercoater" means a coating labeled and formulated to provide a firm bond between the substrate and the subsequent coatings; prevent subsequent coatings from being absorbed by the substrate; prevent harm to subsequent coatings by materials in the substrate; provide a smooth surface for the subsequent application of coatings; provide a clear finish coat to seal the substrate; or block materials from penetrating into or leaching out of a substrate.
- VI.UU. "Reactive penetrating sealer" means a clear or pigmented coating that is labeled and formulated for application to above-grade concrete and masonry substrates to provide protection from water and waterborne contaminants, including but not limited to, alkalis, acids, and salts. Reactive penetrating sealers must penetrate into concrete and masonry substrates and chemically react to form covalent bonds with naturally occurring minerals in the substrate. Reactive penetrating sealers line the pores of concrete and masonry substrates with a hydrophobic coating, but do not form a surface film. Reactive penetrating sealers must improve water repellency at least 80 percent after application on a concrete or masonry substrate, as verified on standardized test specimens in accordance with one or more of ASTM C67-07 "Standard Test Methods for Sampling and Testing Brick and Structural Clay Tile" (2018), ASTM C97-02 "Standard Test Methods for Absorption and Bulk Specific Gravity of Dimension Stone" (2018), or ASTM C140-06 "Standard Test Methods for Sampling and Testing Concrete Masonry Units and Related Units" (2018); must not reduce the water vapor transmission rate by more than 2 percent after application on a concrete or masonry substrate, as verified on standardized test specimens in accordance with ASTM E96/E96M-05 "Standard Test Method for Water Vapor Transmission of Materials" (2016); and products labeled and formulated for vehicular traffic surface chloride screening applications must meet the performance criteria listed in the National Cooperative Highway Research Report 244 "Concrete Sealers for the Protection of Bridge Structures" (1981).
- VI.VV. "Reactive penetrating carbonate stone sealer" means a clear or pigmented coating that is labeled and formulated for application to above-grade carbonate stone substrates to provide protection from water and waterborne contaminants, including, but not limited to, alkalis, acids, and salts. Reactive penetrating carbonate stone sealers must penetrate into carbonate stone substrates and chemically react to from covalent bonds with naturally occurring minerals in the substrates. Reactive penetrating carbonate stone sealers line the pores of carbonate stone substrates with a hydrophobic coating but do not form a surface film. Reactive penetrating carbonate stone sealers must improve water repellency at least 80 percent after application on a carbonate stone substrate, as verified in accordance with ASTM C67-07 "Standard Test Methods for Sampling and Testing Brick and Structural Clay Tile" (2018), ASTM C97-02 "Standard Test Methods for Absorption and Bulk Specific Gravity of Dimension Stone" (2018), or ASTM C140-06 "Standard Test Methods for Sampling and Testing Concrete Masonry Units and Related Units" (2018), and must not reduce the water vapor transmission rate by more than 10 percent after application on a carbonate stone substrate, as verified in accordance with ASTM E96/E96M-05 "Standard Test Method for Water Vapor Transmission of Materials" (2016).
- VI.WW. "Recycled coating" means an architectural coating formulated such that it contains a minimum of 50% by volume post-consumer coating, with a maximum of 50% by volume secondary industrial materials or virgin materials.
- VI.XX. "Residential" means areas where people reside or lodge, including, but not limited to, single and multiple family dwellings, condominiums, mobile homes, apartment complexes, motels, and hotels.

- VI.YY. "Roof coating" means a non-bituminous coating labeled and formulated for application to roofs for the primary purpose of preventing water penetration of the substrate by water, reflecting heat and ultraviolet light, or reflecting solar radiation. Metallic pigmented roof coatings, which qualify as metallic pigmented coatings, are considered to be in the metallic pigmented coatings category.
- VI.ZZ. "Rust preventive coating" means a coating formulated exclusively for nonindustrial use to prevent the corrosion of metal surfaces for direct-to-metal coating or application over rusty, previously coated surfaces. The rust preventative category does not include coatings that are required to be applied as a topcoat over a primer or coatings that are intended for use on wood or any other nonmetallic surface.
- VI.AAA. "Secondary industrial materials" means a finished coating or a finished coating from a manufacturing process that has converted resources into a commodity of real economic value including products or byproducts of the paint manufacturing process that are of known composition and have economic value but can no longer be used for their intended use, but does not include excess virgin resources of the manufacturing process.
- VI.BBB. "Semi-transparent coating" means a coating that contains binders and colored pigments and is formulated to change the color of the surface, but not conceal the grain pattern or texture.
- VI.CCC. "Shellac" means a clear or opaque coating formulated solely with the resinous secretions of the lac beetle (Laccifer lacca), thinned with alcohol, and formulated to dry by evaporation without a chemical reaction.
- VI.DDD. "Shop application" means application of a coating to a product or a component of a product in or on the premises of a factory or a shop as part of a manufacturing, production, or repairing process.
- VI.EEE. "Solicit" means to require for use or to specify, by written or oral contract.
- VI.FFF. "Specialty primer, sealer, and undercoater" means a coating that is formulated for application to a substrate to block water-soluble stains resulting from: fire damage, smoke damage, or water damage.
- VI.GGG. "Stain" means a semi-transparent or opaque coating labeled and formulated to change the color of a surface but not conceal the grain pattern or texture.
- VI.HHH. "Stone consolidant" means a coating that is labeled and formulated for application to stone substrates to repair historical structures that have been damaged by weathering or other decay mechanisms. Stone consolidants must penetrate into stone substrates to create bonds between particles and consolidate deteriorated material and be specified and used in accordance with ASTM E2167-01 "Standard Guide for Selection and Use of Stone Consolidants" (2008).
- VI.III. "Swimming pool coating" means a coating labeled and formulated to coat the interior of swimming pools and to resist swimming pool chemicals and includes coatings used for swimming pool repair and maintenance.
- VI.JJJ. "Thermoplastic rubber coating and mastic" means a coating or mastic formulated and recommended for application to roofing or other structural surfaces and that incorporates no less than 40 percent by weight of thermoplastic rubbers in the total resin solids and may also contain other ingredients including, but not limited to, fillers, pigments, and modifying resins.

- VI.KKK. "Tint base" means an architectural coating to which colorant is added after packaging in sale units to produce a desired color.
- VI.LLL. "Traffic marking coating" means a coating labeled and formulated for marking and striping streets, highways, or other traffic surfaces including, but not limited to, curbs, berms, driveways, parking lots, sidewalks, and airport runways.
- VI.MMM. "Tub and tile refinish coating" means a clear or opaque coating that is labeled and formulated exclusively for refinishing the surface of a bathtub, shower, sink, or countertop. Tub and tile refinish coatings must have a scratch hardness of 3H or harder and a gouge hardness of 4H or harder, as determined on bonderite 1000 in accordance with ASTM D3363-05 "Standard Test Method for Film Hardness by Pencil Test" (2011); a weight loss of 20 milligrams or less after 1000 cycles, as determined with CD-17 wheels on bonderite 1000 in accordance with ASTM D4060-07 "Standard Test Methods for Abrasion Resistance of Organic Coatings by the Taber Abraser" (2014); withstand 1000 hours or more of exposure with few or no #8 blisters, as determined on unscribed bonderite in accordance with ASTM D4585-99 "Standard Practice for Testing Water Resistance of Coatings Using Controlled Condensation" (2018) and ASTM D714-02e1 "Standard Test Method for Evaluating Degree of Blistering of Paints" (2017); and have an adhesion rating of 4B or better after 24 hours of recovery, as determined on inscribed bonderite in accordance with ASTM D4585-99 "Standard Test Methods for Abrasion Resistance of Coatings Using Controlled Condensation" (2018) and ASTM D3359-02 "Standard Test Methods for Measuring Adhesion by Tape Test" (2017).
- VI.NNN. "Veneer" means thin sheets of wood peeled or sliced from logs for use in the manufacture of wood products such as plywood, laminated veneer lumber, or other products.
- VI.OOO. "Virgin materials" means materials that contain no post-consumer coatings or secondary industrial coatings.
- VI.PPP. "Waterproofing membrane" means a clear or opaque coating that is labeled and formulated for application to concrete and masonry surfaces to provide a seamless waterproofing membrane that prevents any penetration of liquid water into the substrate and does not include topcoats in the concrete/masonry sealer category. Waterproofing membranes are intended for below-grade surfaces, between concrete slabs, inside tunnels, inside concrete planters, and under flooring materials. Waterproofing membranes must be applied in a single coat of at least 25 mils (at least 0.025 inch) dry film thickness and meet or exceed the requirements contained in ASTM C836-06 "Standard Specification for High Solids Content, Cold Liquid-Applied Elastomeric Waterproofing Membrane for Use with Separate Wearing Course" (2018). Waterproofing membranes do not include topcoats that are included in the concrete/masonry sealer category (e.g., parking deck topcoats, pedestrian topcoats, etc.)
- VI.QQQ. "Wood coatings" means coatings labeled and formulated for application to wood substrates only. The wood coatings category includes the following clear and semitransparent coatings: lacquers; varnishes; sanding sealers; penetrating oils; clear stains; wood conditioners used as undercoats; and wood sealers used as topcoats. The wood coatings category includes the following opaque wood coatings; opaque lacquers; opaque sanding sealers; and opaque lacquer undercoaters. Wood coatings does not include clear sealers that are labeled and formulated for use on concrete/masonry surfaces or coatings intended for substrates other than wood.
- VI.RRR. "Wood preservative" means a coating labeled and formulated to protect exposed wood from decay or insect attack that is registered with the U.S. EPA under the Federal Insecticide, Fungicide, and Rodenticide Act (7 U.S.C. section 136, et. seq. (1996)).

- VI.SSS. "Wood substrate" means a substrate made of wood, particleboard, plywood, medium density fiberboard, rattan, wicker, bamboo, or composite products with exposed wood grain. Wood Products do not include items comprised of simulated wood.
- VI.TTT. "Zinc-rich primer" means a coating that contains at least 65 percent metallic zinc powder or zinc dust by weight of total solids and is formulated for application to metal substrates to provide a firm bond between the substrate and subsequent applications of coatings. Zinc-rich primers must be labeled in accordance with Section III.D.10.

#### PART C STATEMENTS OF BASIS, SPECIFIC STATUTORY AUTHORITY AND PURPOSE

#### I. Adopted: July 18, 2019

This Statement of Basis, Specific Statutory Authority, and Purpose complies with the requirements of the Colorado Administrative Procedure Act §24-4-103, the Colorado Air Pollution Prevention and Control Act §\$25-7-110 and 25-7-110.5, and the Air Quality Control Commission's (Commission) Procedural Rules.

#### **Basis**

On May 4, 2016, the U.S. Environmental Protection Agency (EPA) published a final rule that determined that Colorado's Marginal ozone nonattainment area failed to attain the 2008 8-hour Ozone National Ambient Air Quality Standard (NAAQS). EPA, therefore, reclassified the Denver Metro North Front Range (DMNFR) area to Moderate and required attainment of the NAAQS no later than July 20, 2018.

In 2015, EPA revised the ozone NAAQS from 0.075 parts per million (ppm) to 0.070 ppm. On June 4, 2018, EPA published a final rule that classified the DMNFR as a Marginal ozone nonattainment area for the 2015 8-hour ozone NAAQS, with an attainment date of August 3, 2021.

In a continued effort to reduce ozone precursor emissions and achieve the ozone NAAQS, the Commission adopted a new Regulation Number 21 to establish VOC content limits for consumer products and AIM coatings manufactured and/or sold in Colorado. The Ozone Transport Commission (OTC) model rules, which are the basis for this rule, achieve additional VOC reductions over EPA's national rules in 40 CFR Part 59, Subparts C and D (1998). Therefore, these standards will reduce VOC emissions from consumer products and AIM coatings and contribute to attaining and maintaining the ozone NAAQS in Colorado.

# **Specific Statutory Authority**

The Colorado Air Pollution Prevention and Control Act, §§25-7-105(1)(a), 25-7-201 through 25-7-206, 25-7-210, 25-7-301, and 25-7-302, C.R.S., authorize the Commission to promulgate a comprehensive State Implementation Plan (SIP) to assure attainment and maintenance of national ambient air quality standards in conformance with the Federal and Colorado Acts. Sections 105(1)(b) and 109 authorize the Commission to establish emission control regulations, including pertaining to hydrocarbons. Section 106(1) authorizes the Commission to establish emission control regulations applicable to the entire state or only within specified areas of the state. Section 106(6) authorizes the Commission to require owners or operators of any air pollution source to establish and maintain reports and record, monitor, and sample emissions. Section 109(2) authorizes the Commission to adopt emission control regulations to reduce emissions of various pollutants, including chemical substances.

### **Purpose**

Consumer products include, for example, adhesives, air-fresheners, cleaners, hair products, and insecticides. AIM coatings include, for example, coatings applied to stationary structures, portable buildings, pavements, or curbs.

The Commission adopted VOC standards in the OTC model rules for consumer products and AIM coatings manufactured, distributed, or sold in Colorado. The standards as applied in the DMNFR are included in Colorado's ozone State Implementation Plan (SIP) and in the remainder of the state as state-only requirements. Specifically, the Commission adopted VOC standards in the OTC AIM coatings model rule phase II (2014) and VOC standards in the OTC consumer products model rule phase IV (2013). The OTC model rules are based on the California Air Resources Board (CARB) standards. CARB develops standards based on technical information and extensive survey data, which is also used to determine compliance with the standards. The Commission adopted definitions, exemptions, labeling, and recordkeeping provisions based on the OTC model rules. The Commission intends that the adopted definitions have the same meanings as in the OTC model rules.

### **Consumer Products**

The Commission adopted VOC content limits, labeling, and reporting provisions for consumer products based on the OTC model rule phase IV. The OTC has also published consumer products models rules phases I, II, III, and V. The OTC model rule phase V was only published in 2018. The Commission adopted Regulation Number 21 based on the OTC model rule phase IV due to the current implementation of this phase by some states, notably by Utah, and the potential increase in VOC emission reductions over EPA's national rule.

The OTC model rule includes provisions to regulate two chemical substances – methylene chloride and perchloroethylene – which are defined as "negligibly reactive volatile organic compounds." Therefore, these chemicals would not achieve VOC, thus ozone, reductions as part of Colorado's ozone SIP. The provisions that regulate these chemicals are considered optional in the OTC Model rules and the Commission decided not to adopt the provisions for methylene chloride and perchloroethylene at this time. The Commission directs the division to investigate the costs and benefits of these additional provisions from a health perspective, and to brief the Commission on their findings as soon as practicable.

# **AIM Coatings**

The Commission adopted VOC content limits, labeling, and reporting provisions for AIM coatings based on the OTC model rule phase II. The OTC has also published an AIM coatings model rule phase I. As with consumer products, Regulation Number 21 is based on the OTC model rule phase II due to the potential increase in VOC emission reductions over EPA's national rule. Further, the OTC model rule phase II is based on California's 2006 standards, which are also being implemented by other states.

Given the need for ozone precursor reductions in the 2020 summer ozone months, the Commission adopted ambitious, but achievable, implementation schedules for the consumer products and AIM coatings VOC content limits. This schedule combined with the sell-through opportunities allows adequate time to reformulate, relabel, and/or redistribute products in order to comply.

### **Additional Considerations**

Colorado must continue to reduce ozone concentrations to attain both the 2008 ozone NAAQS and the 2015 ozone NAAQS. The CAA does not expressly address all of the provisions adopted by the Commission. Rather, federal law establishes the 8-hour ozone NAAQS and requires Colorado to develop a SIP adequate to attain the NAAQS. Therefore, the Commission adopted Regulation Number 21 to make progress towards attainment of the 2008 and 2015 8-hour ozone NAAQS. These revisions do not exceed or differ from the federal act due to state flexibility in developing nonattainment area SIPs. In addition, EPA's national rules, promulgated in 1998, do not limit states from developing more stringent levels of control to attain the ozone standard. However, in accordance with C.R.S. § 25-7-110.5(5)(b), the Commission nonetheless determines:

- (I) In 1998, EPA established national standards to reduce VOC emissions from architectural coatings and consumer products. EPA's national rules do not limit states from developing more stringent levels of control to attain the ozone standard. The OTC model rules, which are the basis for the division's proposal, achieve additional VOC reductions over EPA's national rules in 40 CFR Part 59, Subparts C and D.
- (II) The federal rules discussed in (I) are primarily technology-based in that the rules largely prescribe the use of specific VOC contents in order to comply. The federal rules provide flexibility by allowing reformulation to meet the VOC content limits. The federal rules also provide some product and quantity exemptions.
- (III) The CAA establishes the 8-hour ozone NAAQS and requires Colorado to develop SIP revisions that will ensure attainment of the NAAQS. The ozone NAAQS was not determined taking into account concerns unique to Colorado. EPA's 1998 federal consumer products and architectural coatings rules also do not take into account concerns unique to Colorado or limit Colorado from adopting more stringent standards. The OTC model rules, which are the basis for the division's proposal, achieve additional VOC reductions over EPA's national rules.
- (IV) Colorado must attain the 2008 ozone NAAQS as well as the lower 2015 ozone NAAQS. The adopted VOC standards, based on the OTC consumer products model rule phase four and AIM coatings model rule phase two rather than less stringent OTC model rules, may prevent or reduce the need for the regulated community to meet more stringent requirements later.
- (V) Colorado's attainment date under the 2008 ozone NAAQS, as a Moderate ozone nonattainment area, was July 2018, and if reclassified to Serious, Colorado's attainment date will be July 2021. Colorado's attainment date under the 2015 ozone NAAQS is August 2021. There are no timing issues that might justify changing these time frames.
- (VI) The requirements in Regulation Number 21 address VOC emissions from consumer products and AIM coatings in a cost-effective manner, allowing for continued economic growth in Colorado.
- (VII) The requirements in Regulation Number 21 establish reasonable equity for sources of VOC by providing the same categorical standards for the various consumer product and AIM coatings categories.
- (VIII) Because Colorado did not attain the 2008 ozone NAAQS by July 2018, EPA will likely reclassify Colorado as a Serious ozone nonattainment area, which automatically reduces the major source thresholds from 100 tons per year of VOC and NOx to 50 tons per year; thus subjecting more sources to permitting and categorical RACT requirements. If Colorado does not attain the 2015 ozone NAAQS by August 2021, EPA will likely reclassify Colorado as a Moderate ozone nonattainment area under the 2015 ozone NAAQS. If EPA does not approve Colorado's SIP, EPA may promulgate a Federal Implementation Plan for Colorado. These potential outcomes may subject others to increased costs.
- (IX) The requirements in Regulation Number 21 include minimal monitoring, recordkeeping, and procedural requirements that correlate to requirements in the OTC model rules.
- (X) Demonstrated technology is available to comply with the standards in Regulation Number 21. These standards are being implemented in other states and/or ozone nonattainment areas.

- (XI) As set forth in the Economic Impact Analysis, the requirements in Regulation Number 21 contribute to the prevention of ozone in a cost-effective manner.
- (XII) Although alternative rules could also provide reductions in ozone and help to attain the NAAQS, the Commission determined that the division's proposal was reasonable and cost-effective.

As part of adopting Regulation Number 21, the Commission has taken into consideration each of the factors set forth in C.R.S. § 25-7-109(1)(b).

Colorado must continue to reduce ozone concentrations to attain both the 2008 ozone NAAQS and the 2015 ozone NAAQS. However, to the extent that C.R.S. § 25-7-110.8 requirements apply to this rulemaking, and after considering all the information in the record, the Commission hereby makes the determination that:

- (I) These rules are based upon reasonably available, validated, reviewed, and sound scientific methodologies, and the Commission has considered all information submitted by interested parties.
- (II) Evidence in the record supports the finding that the rules shall result in a demonstrable reduction of the ozone precursor VOC.
- (III) Evidence in the record supports the finding that the rules shall bring about reductions in risks to human health and the environment that justify the costs to implement and comply with the rules.
- (IV) The rules are the most cost-effective to achieve the necessary and desired results, provide the regulated community flexibility, and achieve the necessary reduction in air pollution.
- (V) The rule will maximize the air quality benefits of regulation in the most cost-effective manner.

# **Editor's Notes**

## **History**

New rule eff. 09/14/2019.