



# ENVIRONMENTAL SPECIFICATION GUIDANCE FOR CLEANING SUPPLIES

The District of Columbia is committed to procuring quality goods and services in a timely manner and reasonable cost that support the District in meeting its sustainability goals. Compliance with specification guidance is sufficient to meet PPRA Section 1101(a) environmentally preferable procurement requirements. To access solicitation documents with full contract language, click [here](#).



## BENEFITS

Commonly used disinfectants contain chemicals that cause cancer and asthma.

Green cleaning and disinfecting products are safer and less toxic.

Concentrated cleaning products are

**93%**

less expensive than ready to use formulations.

### SOURCE

[Safer Products and Practices for Disinfecting and Sanitizing Surfaces. 2014. Prepared for San Francisco Department of Environment.](#)

[Espinoza, T., Geiger, C., and I. Eversson. 2009. The Real Costs of Institutional 'Green' Cleaning.](#)

## Scope

This specification addresses four categories of products: A) general purpose cleaning products, B) disinfectants and sanitizers, C) specialty cleaning products, and D) miscellaneous janitorial supplies.

## Specification Language

1. Cleaning, disinfecting, and sanitizing products shall include a Material Safety Data Sheet (MSDS) and product label with a list of ingredients and instructions for proper handling.
2. The product manufacturer or contractor shall offer training on the proper use of cleaning, disinfecting, and sanitizing products upon request.
3. Cleaning, disinfecting, and sanitizing products shall be ordered in concentrated form, wherever practical. Concentrated cleaning products shall be packaged and designed to be used in a closed dilution control system that limits worker exposure to chemical concentrates while facilitating the proper dilution of chemical concentrates.

### CATEGORY A: GENERAL CLEANING PRODUCTS

1. The following cleaning products are classified as Category A:
  - a. General purpose (all purpose) cleaners and degreasers
  - b. Bathroom cleaners and deodorizers (includes hard surface, toilet, and urinal)
  - c. Glass, mirror, and window cleaners
  - d. Carpet, rug, and upholstery cleaners (includes routine and spot cleaning products)
  - e. Floor cleaners, strippers, sealers, and finishes
  - f. Hand soaps, hand cleaners, and hand sanitizers
2. Category A cleaning products shall be certified to at least **ONE (1)** of the following standards:
  - a. Green Seal,
  - b. EcoLogo, or
  - c. EPA Design for the Environment (DfE) (also referred to as EPA Safer Choice)



## Specification Language (continued)

### CATEGORY B DISINFECTING AND SANITIZING PRODUCTS

1. Disinfectants, including antimicrobial mold and mildew cleaners, and non-food contact surface sanitizers shall be EPA FIFRA-registered.
2. The District shall prioritize the purchase of disinfectants and non-food contact sanitizers that only contain the following active ingredients:
  - a. Hydrogen peroxide or accelerated hydrogen peroxide
  - b. Citric acid
  - c. Lactic acid
  - d. Caprylic acid
  - e. Silver

### CATEGORY C SPECIALTY CLEANING PRODUCTS

1. The following cleaning products are classified as Category C Specialty Cleaning Products:
  - a. Metal polish (including but not limited to chrome and brass cleaner)
  - b. Furniture polish
  - c. Graffiti remover
  - d. Gum remover
  - e. Lime and scale remover
2. Category C specialty cleaning products shall either be:
  - a. Green Seal certified;
  - b. Ecologo certified;
  - c. EPA Safer Choice (also referred to as Design for the Environment (DfE) ; OR
  - d. Not contain volatile organic compounds (VOCs) in concentrations that exceed the levels required by the California Air Resources Board's (CARB) Regulation for Reducing Emissions from Consumer Products for the specific product category according to the most current version of the CARB regulations in effect at the time of purchase.

### CATEGORY D MISCELLANEOUS JANITORIAL PRODUCTS

Products purchased by the District shall meet the following criteria:

1. Vacuum cleaners shall have high-efficiency particulate air (HEPA) filters.
2. Microfiber mops, cloths, and sponges shall be purchased instead of cotton.
3. Protective gloves shall not contain PVC or vinyl.
4. Paper towels shall contain at least 40% postconsumer recycled content (PCRC).
5. Toilet paper shall contain at least 20% PCRC.
6. Trash bin and recycling bin liners shall contain at least 10% PCRC or have a thickness of less than 0.7 ml.
7. Recycling bin liners shall be clear, white, or natural in color.



## Specification Language (continued)

8. Composting bin liners shall be Biodegradable Products Institute (BPI) certified to meet the ASTM D6400 standard for commercial compostability of plastics.

### **Reporting**

1. Material Safety Data Sheets (MSDS) and product labels for purchased cleaning, disinfecting, and sanitizing products - To be provided via email in Excel, Word, or in a PDF when purchased products are delivered.
2. Environmentally Preferable Products and Services (EPPS) Report - To be provided annually or as requested in Excel and delivered via email. The report shall include the following information:
  - a. Contractor name
  - b. Contract #
  - c. PO #
  - d. Contract award date
  - e. Product description - manufacturer description of product
  - f. Sku
  - g. Corresponding environmentally preferable product type based on the product types listed in the scope section of the Environmental Guidance Document for Cleaning Supplies (ex. Toilet paper)
  - h. Number of units sold
  - i. Price per unit
  - j. Total cost
  - k. Compliance with DC environmental criteria – Indicate how each product purchased is compliant with DC environmental requirements (ex. Green Seal certification). If the environmental requirement was not specified in the solicitation, indicate NA.

An EPPS Report template is available to assist Contractors in meeting the District's EPPS reporting requirements on the [Sustainable Purchasing Program web page](#).



## Background Information



**Green Seal** is a non-profit standard-setting organization certifying a range of products and services. Green Seal conducts scientific testing and on-site audits to verify that products meet recognized standards. Relevant standards include: GS-01: Sanitary Paper Products; GS-34: Cleaning and Degreasing Agents; GS-37: Cleaning Products for Industrial and Institutional Use; GS-40: Floor-Care Products; GS-41: Hand Cleaners; and GS-53: Specialty Cleaning Products. Green Seal cleaning products are widely available and commonly specified by jurisdictions throughout the United States. Certified products can be found at [www.greenseal.org/FindGreenSealProductsAndServices.aspx](http://www.greenseal.org/FindGreenSealProductsAndServices.aspx)



**EcoLogo** certifications are managed by UL, a global safety science company. Similar to Green Seal, EcoLogo certifies cleaning and other types of products based on scientific testing and third-party audits. Relevant standards include: UL2784/CCD-104: Hand Cleaners; UL2796/CCD 107: Odor Control Products; UL2792/CCD-110: Cleaning and Degreasing Compounds; UL2759/CCD-146: Hardsurface Cleaners; UL2777/CCD-147: Hard Floor Care Products; UL2795/CCD-148: Carpet and Upholstery Cleaners; UL2783/CCD-170: Instant Hand Antiseptics; and UL175: Sanitary Paper Products. Compliant products are listed in UL's Sustainable Product Guide. EcoLogo cleaning products are widely available, and are specified by several jurisdictions throughout the country.



U.S. Environmental Protection Agency's **Design for the Environment (DfE)** label was renamed **Safer Choice** in March 2015. Products which have been certified by the program may use either name or logo during the name transition. The program screens products for potential human and environmental hazards and only labels products with ingredients that pose the least concern among chemicals in their class. A variety of cleaning products carry the logo, including: all-purpose cleaners; carpet cleaners; floor cleaners, finishers, and strippers; hand soaps; toilet bowl cleaners; and window/glass cleaners. The Environmental Protection Agency (EPA) lists labeled products at <http://www2.epa.gov/saferchoice/products>. Several jurisdictions specify products with the label.



**Disinfectants** and **sanitizers** play an important role in keeping people healthy by killing bacteria, viruses, and other organisms that can make people sick. As the products are designed to kill living organisms, they are inherently toxic and should be used only as required.

The **Federal Insecticide and Fungicide Act (FIFRA)** requires that disinfecting and sanitizing products be registered as a pesticide with EPA and only use EPA-approved efficacy claims on the product label. Product labels detail the types of bacteria, viruses, and fungi the product is approved to kill, the dwell time, or the amount of time it takes for the product to kill specified organisms, and the level or percent of microorganisms killed when a product is used according to manufacturer's instructions. All FIFRA-registered products and their registration forms can be found in EPA's Pesticide Product Label System (PPLS) database accessible [here](#). Care should be taken to use a disinfectant or sanitizer which is registered to be effective in killing targeted pathogens.

**Active ingredients** in commonly used disinfectants and sanitizers can cause cancer, asthma, and skin irritation or sensitization. Safer Products and Practices for Disinfecting and Sanitizing Surfaces, a 2014 report prepared for the City of San Francisco's Department of Environment, identified safer sanitizers and disinfectants that meet the city's performance needs for these products. The active ingredients listed in the specification language of this guidance document were recommended through this study because they are not known or suspected to cause negative health impacts commonly associated with this class of chemicals and they are effective at killing targeted microorganisms. Performance and environmental and human health information on these active ingredients as well as information on the specific products tested can be found in the report which can be downloaded [here](#). Active ingredients used in a disinfectant or sanitizer are listed on the product label as an active ingredient.

Procuring **concentrated** cleaning, disinfecting, and sanitizing products saves money and reduces energy consumption associated with the transport of the product purchased in a diluted, **ready to use** form. With very concentrated products, **closed dilution control systems** are used to: 1) Eliminate the potential for exposure to the cleaning product in concentrated form thereby reducing the potential for accidents or injury; and 2) Ensure no more of the product is used than required to get the desired results. Green Seal, EcoLogo, and DfE/Safer Choice standard include criteria for when a closed dilution control system is required as well as performance and



## Background Information (continued)

safety criteria for the dilution control system. While the use of concentrated cleaning products is encouraged, it may not be appropriate for every type of cleaning product, use, or application. **Ready to use** cleaning products should be purchased and used as needed.



### Postconsumer recycled content (PCRC)

reflects the proportion of a product recycled from consumer materials that otherwise would have been disposed. Consistent with U.S. EPA's Comprehensive Procurement Guidelines, this specification requires purchasing janitorial paper products with varying levels of recycled content. The Guidelines serve as the model for specifications in many jurisdictions around the country. Other forms of recycled content not included in the specification include pre-consumer recycled content and total recycled content. Pre-consumer recycled content refers to the percent of a product made from manufacturing waste, while total recycled content refers to the sum of the postconsumer and pre-consumer recycled content. Note that the recycled content logo is not required. For more information, see EPA's product category definitions at [epa.gov/epawaste/conservetools/cpg/products/define.htm](http://epa.gov/epawaste/conservetools/cpg/products/define.htm)

**Microfiber** mops, cloths, and sponges have several benefits over cotton. First, microfiber traps dirt from surface cracks and crevices that cotton cleaning products are too large to reach. Second, microfiber requires less water and chemicals than conventional cotton cleaning products. Third, using microfiber instead of cotton helps preserve surface finishes by not leaving scratches. Fourth, microfiber mops are lightweight and safer to use than conventional mops. Finally, microfiber cleaning products can save money in the long run by using less water and chemicals, increasing productivity, and preventing injuries.



### High-efficiency particulate air (HEPA)

vacuum cleaners trap dust and other irritants, improving indoor air quality. HEPA air filters are designed according to federal standards to remove 99.97% of airborne particles measuring

0.3 micrometers in diameter. By trapping harmful particles such as dust mites and pollen, HEPA filters prevent or reduce health problems such as allergies and asthma.

This specification prohibits the purchase of gloves made with **vinyl (PVC or polyvinyl chloride)**. PVC is made from vinyl chloride and a variety of additives, often including a class of chemicals called phthalates. Many types of phthalates used to manufacture PVC are included on California's Proposition 65 List for carcinogenicity and reproductive toxicity. The additives can be released when flexible PVC is bent through off-gassing. Vinyl chloride, the base material used to make PVC, is classified as a human carcinogen by the U.S. EPA. Plants that manufacture PVC may emit vinyl chloride during manufacture, exposing workers and the local community to a carcinogenic compound. More information about PVC is available at: [http://toxtown.nlm.nih.gov/text\\_version/chemicals.php?id=84](http://toxtown.nlm.nih.gov/text_version/chemicals.php?id=84)



This specification requires bin liners used to collect and transport waste for composting are **Biodegradable Product Institute (BPI) certified** to meet the

ASTM D6400 standard for commercial compostability of plastics. This means that the products have been independently tested and verified to decompose in industrial or municipal facilities without leaving behind harmful toxics or plastic residues. A database of BPI certified compostable products is available at <http://products.bpiworld.org/>.



**Environmental Hotspots** Key human health and environmental benefits associated with this specification

**WATER CONSUMPTION** Microfiber mops, cloths, and sponges use less liquid than cotton, which reduces water and chemical use.

**RECYCLED CONTENT** This specification requires PCRC for janitorial paper products, which reduces the demand for virgin wood.

**TOXICITY/HEAVY METALS** This specification prohibits or restricts certain toxic chemicals that have been linked to serious health problems for building occupants and janitorial staff, including asthma and cancer. The specification also requires training to minimize adverse impacts from product use. In addition, HEPA vacuums use filters that trap dust and other irritants, improving indoor air quality.

**PACKAGING** Green Seal, EcoLogo, and Safer Choice/ DfE require less material-intensive packaging methods and/or recycled content for packaging of their certified products.

**END-OF-LIFE DISPOSAL** Green Seal, EcoLogo, and Safer Choice/ DfE require distributors to offer training or information on proper disposal methods to reduce adverse impacts on health and the environment.

**Significance to the District**

**PPRA** PPRA § 104 specifies that products meet Default Environmental Standards. U.S. EPA's Comprehensive Procurement Guidelines for post-consumer recycled content (PCRC), Green Seal, Eco Logo, and EPA's Safer Choice/ DfE label all are Default Environmental Standards (DES).

**LEGISLATION** Healthy Schools Act of 2010, Section 501 requires the use of environmentally friendly cleaning supplies in public schools.

**LEED FOR EXISTING BUILDINGS: O&M** LEED v4 awards one point for Indoor Environmental Quality: Green Cleaning—Products and Materials if at least 75%, by cost, of the total annual purchases of these products meet green cleaning requirements. This covers Green Seal, Eco Logo, Safer Choice/DfE, and EPA's Comprehensive Procurement Guidelines for janitorial paper products and trash bin liners.

For more information about sustainable specification guidance or the District's Sustainable Purchasing Program, please visit: <http://ocp.dc.gov/page/sustainable-purchasing>, call the OCP Customer Contact Center at: [202.724.4477](tel:202.724.4477), or email [sppdc@dc.gov](mailto:sppdc@dc.gov)