

# 2007 CPG

## COMPREHENSIVE PROCUREMENT GUIDELINES

### LANDSCAPING



#### Buying recycled products...

- ...conserves natural resources
- ...saves energy
- ...reduces solid waste
- ...reduces air and water pollutants
- ...reduces greenhouse gases
- ...creates new jobs



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# Buy-Recycled Series

## LANDSCAPING PRODUCTS

**I**t might be easier than you think to turn garbage into gardens! Whether you are a park manager, professional landscaper, or tend a small garden bed, you will find recycled-content products offer a quick, effective, and affordable way to make your grounds green.

To make it easier to buy recycled, the U.S. Environmental Protection Agency (EPA) periodically updates the Comprehensive Procurement Guidelines (CPG). Through the CPG, EPA designates items that must contain recycled materials when purchased with appropriated federal funds by federal, state, and local agencies, or by government contractors. Several landscaping products are among these items. EPA's research shows that the items designated in the CPG are of high quality, widely available, and cost-competitive with virgin products. EPA also issues nonregulatory companion guidance—the

Recovered Materials Advisory

Notice (RMAN)—that recommends levels of recycled content for these items.

### Why Buy Recycled?

Recycling is more than just dropping off your cans, bottles, and newspapers at the curb or at a local collection facility. Diverting recyclables from the waste stream is only the first of three steps in the recycling process. The second step occurs when companies use these recyclables to manufacture new products. The third step comes when you purchase products made from recovered materials.

Buying recycled products results in many environmental benefits. It supports local recycling programs by creating markets for the collected materials that are processed and used to manufacture new products. This creates jobs and helps strengthen the economy; conserves natural resources; saves energy; and reduces solid waste, air and water pollutants, and greenhouse gases that contribute to global warming.

# What Is CPG?

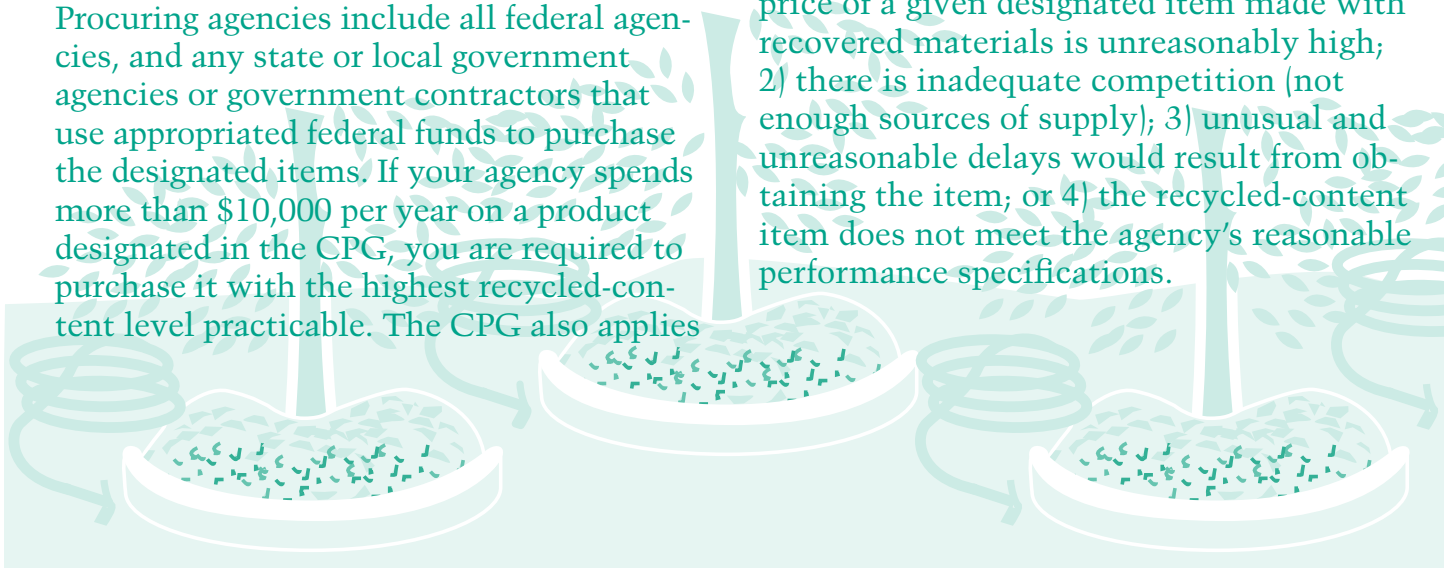
The Resource Conservation and Recovery Act (RCRA) requires procuring agencies to buy recycled-content products designated by EPA in the CPG. Issued in May 1995, the first CPG designated 19 new products (including hydraulic mulch) and incorporated five previously designated items in eight product categories. The first CPG update (CPG II) was published in November 1997 and designated an additional 12 items, including garden and soaker hoses, as well as lawn and garden edging. A second CPG update (CPG III) was published in January 2000 and designated an additional 18 items, including food waste compost and plastic lumber landscaping timbers and posts. The third CPG update (CPG IV), published in April 2004, designated seven new products but no additional landscaping products. Most recently, a fourth CPG update (CPG V), published in September 2007, revised the compost designation and added fertilizer made from recovered organic materials to the landscaping products category. For more information, visit [www.epa.gov/epaoswer/non-hw/procure/about.htm](http://www.epa.gov/epaoswer/non-hw/procure/about.htm).

Procuring agencies include all federal agencies, and any state or local government agencies or government contractors that use appropriated federal funds to purchase the designated items. If your agency spends more than \$10,000 per year on a product designated in the CPG, you are required to purchase it with the highest recycled-content level practicable. The CPG also applies

to lease contracts covering designated items. Executive Order (E.O.) 13423 and the Federal Acquisition Regulation also call for an increase in the federal government's use of recycled-content and environmentally preferable products.

Once any new items are designated in a published CPG update, an agency has 1 year to develop an affirmative procurement program (or revise an existing one) to include these new items. In previous years, agencies have had to revise their affirmative procurement programs to incorporate items such as hydraulic mulch, compost, garden and soaker hoses, lawn and garden edging, and plastic lumber landscaping timbers and posts. Because CPG V designated new landscaping products, agencies are required to revise the landscaping portion of their affirmative procurement program by September 14, 2008.

The CPG acknowledges that specific circumstances might arise that preclude the purchase of products made with recovered materials. Your agency may purchase designated items that do not contain recovered materials if it determines that: 1) the price of a given designated item made with recovered materials is unreasonably high; 2) there is inadequate competition (not enough sources of supply); 3) unusual and unreasonable delays would result from obtaining the item; or 4) the recycled-content item does not meet the agency's reasonable performance specifications.



# How Do I Purchase Recycled-Content Landscaping Products?

The EPA issues purchasing guidance in RMANs, which are designed to make it as easy as possible to buy the designated items. The RMANs recommend recycled-content levels to look for when purchasing landscaping products, as shown in the chart below. Following the RMANs' recommended levels will help ensure your affirmative procurement program and standards meet the buy-recycled requirements. The RMANs also provide other purchasing guidance. Please refer to <[www.epa.gov/cpg/products.htm](http://www.epa.gov/cpg/products.htm)> for more information on individual products.

Rather than specifying just one level of recycled content, the RMANs recommend ranges that reflect actual market conditions. The recommendations are based on market research identifying recycled-content products that are commercially available, are competitively priced, and meet buyers' quality standards.

Access EPA's online recycled-content products database by going to <[www.epa.gov/cpg](http://www.epa.gov/cpg)> and selecting "Supplier Database." See the last section of this resource guide for other helpful resources.

## EPA's Recommended Content Levels for Landscaping Products

LANDSCAPING PRODUCT	MATERIAL RECOVERED	POST-CONSUMER RECOVERED CONTENT	TOTAL RECOVERED CONTENT
<b>Hydraulic Mulch</b>	Paper	100%	—
	Wood/Paper	—	100%
<b>Compost Made from Recovered Organic Materials</b>	Food Waste, Yard Trimmings, Manure, Biosolids, and Other Recovered Organic Materials	See Endnote 2	See Endnote 2
<b>Fertilizer Made from Recovered Organic Materials</b>	Alfalfa Meal, Blood Meal, Cottonseed Meal, Feather Meal, Fish Meal, Meat and Bone Meal, Poultry Manure/Litter, Soybean Meal, Wood Ash, and Other Recovered Organic Materials	See Endnote 2	See Endnote 2
<b>Garden Hose</b>	Rubber and/or Plastic	60–65%	—
<b>Soaker Hose</b>	Rubber and/or Plastic	60–70%	—
<b>Lawn and Garden Edging</b>	Rubber and/or Plastic	30–100%	30–100%
<b>Landscaping Timbers and Posts</b>	High-density Polyethylene (HDPE)	25–50%	75–100%
	Mixed Plastic/Sawdust	50%	100%
	HDPE/Fiberglass	75%	95%
	Other Mixed Resins	50–100%	95–100%

<sup>1</sup> EPA's recommendations do not preclude procuring agencies from purchasing landscaping products manufactured using other materials. EPA simply recommends that procuring agencies, when purchasing landscaping products designated in the procurement guidelines, purchase these products containing recovered materials.

<sup>2</sup> EPA is not recommending any content ranges for either compost or fertilizer since both are generally made exclusively from recovered materials. EPA recommends that procuring agencies purchase or use mature compost made from recovered organic materials in such applications as landscaping, seeding of grass or other plants on roadsides and embankments, as nutritious mulch under trees and shrubs, and in erosion control and soil reclamation. EPA further recommends implementing a composting system for these materials when agencies have an adequate volume and sufficient space.



## Planting the Seeds: Hydraulic Mulch

You might be establishing wildflowers along an interstate or replanting grass on a public golf course. In either case, your first step is to plant the seeds. Hydraulic mulch is a quick, proven, and affordable way to help get the job done. Utilizing recovered newspaper and wood products, hydraulic mulch is commonly used in highway construction projects to grow grass along embankments, medians, and roadways. It also is used in recreational areas and on residential lawns. Through hydroseeding, a mixture of water, seeds, and hydraulic mulch is sprayed over soil. The mulch stabilizes the soil, prevents wind and water erosion, and provides protection and warmth for the seeds, helping them grow. Be sure you require that contractors use hydraulic mulch for all your hydroseeding projects, where appropriate. Hydraulic mulch not only protects young seeds from the elements; it also strengthens demand for wood waste and the newspaper you recycle in your local recycling program.

## Strengthening the Soil: Compost and Fertilizer Made from Recovered Organic Materials

Used frequently in both commercial and residential landscaping, compost and fertilizer made from recovered organic materials turn the organic waste we might otherwise throw away—such as grass, leaves, twigs, fruit and vegetable trimmings, biosolids and manure—into an effective soil amendment.

There is a significant overlap in the type of recovered organic materials that can go into compost and fertilizer made from recovered organic materials. Their use is similar in most circumstances. However, to differentiate between the two: fertilizer's intended use is to add certain nutrients into the soil, compost has many additional uses.

**Fertilizers** typically provide, in varying proportions, the three major plant nutrients (nitrogen, phosphorus, and potassium) and the secondary plant nutrients (calcium, sulfur, magnesium).

Fertilizer changes the chemical state of the soil adjacent to plant roots, and the plants draw the feed—whether applied as a liquid or as a dry fertilizer—into the plant with water needed by the plant.

**Compost** affects the nutritional potential of the root environment by adding nutrient storage capacity. It attracts beneficial organisms that make fertilizer more available to the plant, and moderates the acidity or alkalinity of the soil. Worked in, it improves the permeability of the soil to water, improves soil granulation and fosters better root growth, and helps to add pore space within the soil structure for better oxygenation and water storage. Additionally, compost can suppress some plant diseases and prevent soil erosion when used as cover for seeded grass.

With an increase in the number of composting facilities from 651 in 1988 to 3,800 in 2000, the market is clearly growing for this valuable product. Even so, more yard trimmings and food waste still could be composted. In 2000, these valuable organic materials constituted more than 23 percent of our national waste stream, with 53.6 million tons generated, of which only about 30 percent of that amount (16.5 million tons) was recovered for composting.

## Quenching Mother Nature's Thirst: Garden and Soaker Hoses

Once your seeds are planted and the soil is enhanced with nutrient-rich compost, nothing is more important than adequate watering. The questions of how much and how often to water are a matter of local climactic conditions, but one thing is clear—buying recycled-content garden and soaker hoses is the ideal choice for watering your garden or planted areas. Not only will these hoses deliver water to meet your garden's needs, they also will help create new uses for old tires and recycled plastics from items such as discarded cable wires and old traffic cones.



## ■ Building a Home for the Garden: Landscaping Timbers and Posts (Plastic Lumber)

To create attractive and effective landscaping, you will need some construction skills as well as a green thumb. Raised beds, for example, will frame and protect flower beds. Framed walkways, bordered lawns, and flower beds all enhance the appearance of a landscape. Likewise, retaining walls can control erosion. Whether you are beautifying a park, highway, housing development, zoo, or the exterior of an office building, you can do it with recycled-content landscaping timbers and posts. The National Park Service is leading the way with more than a dozen projects using timbers and posts manufactured with plastic or composite lumber, which give new life to recovered wood and plastic materials such as milk jugs and plastic bags.

## ■ The Border Line: Lawn and Garden Edging

When you are ready to finish the job, recycled-content lawn and garden edging provides the perfect barrier for delineating your beds. Sold in both industrial and residential strengths, these quality products help keep grass and weeds out of flower and vegetable beds, saving time and money. You can purchase up to 100 percent post-consumer recycled-content edging, which is made from scrap rubber, milk jugs, and other plastic containers.

# How Can I Get More Information?

This resource guide and the following resources on buying recycled-content products can be accessed on the Internet.



## Information Available From EPA

- **The CPG:** <[www.epa.gov/cpg](http://www.epa.gov/cpg)>. This site describes EPA's effort to facilitate the procurement of products containing recovered materials, including information on CPG and RMANs, and an online database of manufacturers and suppliers of designated items.
- **EPA CPG Program:** <[www.epa.gov/cpg/pdf/cpgfs.pdf](http://www.epa.gov/cpg/pdf/cpgfs.pdf)>. This resource guide provides general information about the CPG and the development of affirmative procurement programs.
- **Environmentally Preferable Purchasing (EPP):** <[www.epa.gov/epp](http://www.epa.gov/epp)>. EPA's EPP program encourages and assists federal agencies in purchasing environmentally preferable products and services. The site explains EPA's proposed guiding principles for including environmental performance in purchasing decision-making, and posts case studies of successful pilot projects in both the public and private sectors.
- **Jobs Through Recycling:** <[www.epa.gov/jtr](http://www.epa.gov/jtr)>. EPA's Jobs Through Recycling program stimulates economic growth and recycling market development by assisting businesses and supporting a network of state and regional recycling contacts. This Web site provides information on financing and technical assistance for recycling businesses, as well as other market development tools.
- **Municipal Solid Waste:** <[www.epa.gov/msw](http://www.epa.gov/msw)>. This site includes information on recycling, source reduction, and reuse. It contains state municipal solid waste data and the latest facts and figures on waste generation and disposal.
- **WasteWise:** <[www.epa.gov/wastewise](http://www.epa.gov/wastewise)>. WasteWise is a free, voluntary EPA program through which organizations eliminate costly municipal solid waste, benefitting their bottom line and the environment. The program provides hands-on assistance to members to help them purchase or manufacture recycled-content products, prevent waste, and recycle solid waste materials.



■ **Composting Publications:** <[www.epa.gov/compost](http://www.epa.gov/compost)>. This site features the following compost resources.

- Innovative Uses of Compost—Bioremediation and Pollution Prevention (EPA530-F-97-042).
- Innovative Uses of Compost—Erosion Control, Turf Remediation, and Landscaping (EPA530-F-97-043).
- Innovative Uses of Compost—Disease Control for Plants and Animals (EPA530 F-97-044).
- Innovative Uses of Compost—Composting of Soils Contaminated by Explosives (EPA530-F-97-045).
- Innovative Uses of Compost—Reforestation, Wetlands Restoration, and Habitat Revitalization (EPA530-F-97-046).
- **Biosolids Web Page:** <[www.epa.gov/owm/mtb/biosolids](http://www.epa.gov/owm/mtb/biosolids)>. This Web page outlines EPA's regulations and requirements for the production, use, and application of biosolids.

■ **Federal Register (FR):** <[www.epa.gov/cpg/backgrnd.htm](http://www.epa.gov/cpg/backgrnd.htm)> and <[www.epa.gov/epaoswer/non-hw/procure/about.htm](http://www.epa.gov/epaoswer/non-hw/procure/about.htm)>. Notices promulgating CPG I (60 FR 21370) and RMAN I (60 FR 21386), May 1, 1995. FR notices promulgating CPG II (62 FR 60961) and RMAN II (62 FR 60975), November 13, 1997. FR notices promulgating CPG III (65 FR 3070) and RMAN III (65 FR 3082), January 19, 2000. FR notices promulgating CPG IV (69 FR 24028) and RMAN IV (69 FR 24039), April 30, 2004. FR notices promulgating CPG V (72 FR 52475) and RMAN V (72 FR 52561), September 14, 2007.



## Other Government Sources

■ **U.S. General Services Administration (GSA) Environmental Products Overview:** <[www.gsa.gov/Portal/gsa/ep/channelView.do?pageTypeId=8207&channelPage=/ep/channel/gsaOverview.jsp&channelId=-12972](http://www.gsa.gov/Portal/gsa/ep/channelView.do?pageTypeId=8207&channelPage=/ep/channel/gsaOverview.jsp&channelId=-12972)>. GSA offers a variety of environmental products and services to its federal customers to assist them in their efforts to comply with procurement responsibilities outlined in federal environmental laws and regulations. This

overview contains information about environmentally oriented products and services in the Federal Supply Service Supply System. To access GSA Advantage!, GSA's Internet-based ordering system, and order any GSA product, visit <[www.gsaadvantage.gov](http://www.gsaadvantage.gov)>.

– **Environmental Products Guide:** <[www.gsa.gov/Portal/gsa/ep/home.do?tabId=2](http://www.gsa.gov/Portal/gsa/ep/home.do?tabId=2)>. This guide contains more than 1,500 paper and paper products containing recovered materials.

■ **Office of the Federal Environmental Executive (OFEE):** <[www.ofee.gov](http://www.ofee.gov)>. OFEE's mission is to advocate, coordinate, and assist environmental efforts of the federal community in waste prevention, recycling, affirmative procurement of CPG items, and the acquisition of recycled and environmentally preferable products and services.

– **Greening the Government: A Guide to Implementing E.O. 13101:** <<http://ofee.gov/eo/greening.pdf>>. This guide provides detailed information on the requirements of E.O. 13101, which established a process for amending the CPG and issuing RMANs. E.O. 13101 preceded E.O. 13423 and established many requirements and definitions that are still in effect. Updated in February 2001, the E.O. is available from OFEE at <[www.ofee.gov](http://www.ofee.gov)>.

– **Executive Order 13423: Strengthening Federal Environmental, Energy, and Transportation Management:** <[http://ofee.gov/eo/eo13423\\_main.asp](http://ofee.gov/eo/eo13423_main.asp)>. Published in January 2007, this Order replaced E.O. 13101 and requires federal agencies to purchase green products and services, including recycled-content products, energy- and water-efficient products, biobased products, and environmentally preferable products and services. Although E.O. 13423 revoked E.O. 13101, EPA continues to follow certain procedures of E.O. 13101 since they are consistent with the requirements of RCRA 6002 (e).

– **Federal Green Purchasing Program:** <[www.ofee.gov/gp/gp.asp](http://www.ofee.gov/gp/gp.asp)>. This program assists federal agencies to promote the acquisition of recycled-content, environmentally preferable, and biobased products; non-ozone depleting substances; and products containing alternatives to certain priority chemicals. Training tools and other green purchasing guidance are available.



- **U.S. Department of Agriculture's (USDA) National Organic Program:** <[www.ams.usda.gov/NOPI/indexIE.htm](http://www.ams.usda.gov/NOPI/indexIE.htm)>. This site discusses USDA regulations for producing organic products, which prohibit the use of biosolids in organic production.
- **Federal Trade Commission:** <[www.ftc.gov/bcp/gnrule/guides980427.htm](http://www.ftc.gov/bcp/gnrule/guides980427.htm)>. The Federal Trade Commission issued Guides for the Use of Environmental Marketing Claims in May 1998.
- **FedCenter.gov:** <[www.fedcenter.gov](http://www.fedcenter.gov)>. FedCenter is the federal government's home for comprehensive environmental stewardship and compliance assistance information.
- **California Recycled-Content Product Database:** <[www.ciwmb.ca.gov/RCP](http://www.ciwmb.ca.gov/RCP)>. This site contains information on reasons to buy recycled-content products and how to procure them, and provides access to a database with information on products, as well as manufacturers, distributors, reprocessors, mills, and convertors across the country who procure or produce these products.
- **King County Recycled Product Procurement Program:** <[www.metrokc.gov/procure/green/index.htm](http://www.metrokc.gov/procure/green/index.htm)>. This site describes the tools and techniques developed by King County, Washington, agencies for purchasing recycled products.
- **Recycling Data Network Information Services:** <[www.recyclingdata.com/contents.htm](http://www.recyclingdata.com/contents.htm)>. This commercial Web site provides access, on a subscription basis, to a recycled-content products database of over 4,500 listings in 700 product classifications. The product database is considered to be the largest of its kind.
- **Recycled Plastic Products Source Book:** <[www.americanplasticscouncil.org](http://www.americanplasticscouncil.org)>. This booklet lists more than 1,400 plastic products from approximately 300 manufacturers.
- **The U.S. Composting Council (USCC):** <[www.compostingcouncil.org](http://www.compostingcouncil.org)>. USCC defines and develops industry-wide standards for composts made from recovered organic materials. USCC offers educational materials and workshops on composting.
- **Organic Materials Review Institute:** <[www.omri.org](http://www.omri.org)>. This site has guidelines and lists of materials allowed and prohibited for use in the production, processing, and handling of organically grown products.
- **Green Seal:** <[www.greenseal.org](http://www.greenseal.org)>. Green Seal is a national nonprofit labeling organization that sets environmental standards, including those for garden hoses, and awards a Green Seal of Approval to products meeting those standards.



## Additional Sources

- **Buy Recycled Business Alliance:** <[www.nrc-recycle.org](http://www.nrc-recycle.org)>. The Alliance includes over 3,200 companies and organizations committed to increasing the use of recycled-content products and materials in the day-to-day operations. The Alliance offers educational materials, a quarterly newsletter, and product-specific guides. Public purchasing entities can join for free.
- **The Official Recycled Products Guide:** <[www.dep.state.pa.us/wm\\_apps/recycledproducts/](http://www.dep.state.pa.us/wm_apps/recycledproducts/)>. This directory lists more than 5,000 manufacturers and distributors of recycled-content products.

