

# Less Toxic Alternatives to Hazardous Household Products

For more information contact Harris County at (713) 316-3580 or [www.cleanwaterclearchoice.org](http://www.cleanwaterclearchoice.org).

Information in this publication was obtained from the *Environmental Bulletin: Less-Toxic Alternatives* flyer published by the Texas Commission on Environmental Quality (TCEQ) and the *Alternative Household Product Recipes* brochure published by Los Angeles County.

## Air Fresheners/Deodorizers

- Leave open boxes of baking soda in refrigerator, closets and bathrooms.
- Saturate cotton ball with pure vanilla; place on a saucer in refrigerator or car.
- Set out white vinegar in open dishes to destroy odors.
- Set out potpourri or fresh oranges with cloves in open dishes.
- Simmer cinnamon and cloves or burn scented candles.
- Sprinkle baking soda in the bottom of cat box before adding kitty litter.
- Sprinkle baking soda in the bottom of garbage cans to control odors.
- To clean garbage disposals, grind used lemons in the disposal or pour in baking soda.
- For carpets, mix 1 part borax to 2 parts cornmeal; sprinkle liberally on carpet and vacuum after one hour.



## Cleaners

- Mix vinegar with salt and water for a good surface cleaner.
- Dissolve baking soda in water for a general cleaner.
- For washing dishes by hand, use ½ cup baking soda with a mild dishwashing liquid to help cut grease and food.
- For automatic dishwashers, choose a detergent with the lowest phosphate content listed on the package.
- Wash painted wood with 1 teaspoon of sodium carbonate or washing soda in 1 gallon of hot water. Rinse with clear water.
- Clean coffee pot surfaces with a mixture of warm water and baking soda or vinegar.
- Clean the interior of coffee pots with white vinegar according to manufacturer's directions.
- As a disinfectant, use ½ cup borax in 1 gallon of hot water. To inhibit mold and mildew, do not rinse off borax mixture.
- Always use mild, biodegradable detergents. Look for naturally derived or glycerine-based soaps.

## Glass Cleaners

- Combine 1 quart of water with ¼ to ½ cup of white vinegar, 1 to 2 tablespoons of lemon juice or 1 to 2 tablespoons of rubbing alcohol; spray on surfaces and wipe clean with soft, lint-free cloth.
- Combine juice from 1 lemon, 2 cups water or club soda, 1 teaspoon cornstarch, ½ teaspoon peppermint essential oil (optional); shake well and spray on windows.
- Dip glassware and crystal into water mixed with a splash of vinegar and dry with lint-free dishcloth.

## Oven Cleaners

- Use a non-aerosol oven cleaner that does not contain lye.
- Sprinkle salt on spills when they are warm, then scrub.
- Scrub spots with a baking soda, salt and water paste.
- Mix 3 tablespoons of washing soda with 1 quart warm water.
- Dip a wet sponge in baking soda to clean glass oven doors.
- Mix 2 tablespoons liquid soap, 2 tablespoons borax and 1 quart of warm water; leave on oven for 20 minutes then scrub with fine steel wool or a non-chlorinated scouring powder.
- Mix equal parts of castile soap, borax & water. Let mixture set for 20 minutes and scrub with mixture of baking soda & salt.



## Mildew Cleaners

- Scrub mildew spots with baking soda or borax, or sponge with white vinegar.
- Scrub area with a paste of lemon juice or white vinegar and salt.
- To clean mildew from shower curtain, machine wash with ½ cup soap and ½ cup baking soda; add 1 cup white vinegar to rinse cycle.

## Scouring Powders

- Use a non-chlorinated scouring powder with a nylon scouring pad or fine steel wool as a kitchen degreaser; sprinkle baking soda, add juice of ½ lemon and scrub.

## **Pesticides and Insect Repellants**

- To make a bug repellent for the body mix 2 tablespoons citronella essential oil, 2 tablespoons rosemary essential oil, 2 tablespoons geranium essential oil, 2 tablespoons eucalyptus essential oil, and ½ cup olive oil. Dab on clothing and skin, avoiding eyes and mouth.
- For an anti-insect spritzer, mix 2 cups vodka, 1 tablespoon citronella essential oil, 1 tablespoon eucalyptus essential oil, 1 tablespoon geranium essential oil, 1 tablespoon rosemary essential oil, 1 tablespoon orange essential oil, and 1 tablespoon lemon essential oil. Shake well and mist into air to keep bugs away.
- For an insect spray, dissolve 1 cup grated castile soap in 1 cup boiling water and set aside. In blender, pour 2 cups boiling water over 1 cup coarsely chopped tobacco leaves and let set for ten minutes. Add 1 entire bulb of chopped garlic and 1 cup fresh tansy (optional) and blend until smooth. Strain through cheesecloth and discard solid materials. Add castile soap to mixture and stir; pour into spray bottle. Spray on insects and their environs at early morning and dusk for three days in a row. Because this mix drives most bugs away, but does kill them, apply as needed.

## **Ants**

- Trace a line of ants to find out where they are entering the house and then seal it off. You can also try pouring a barrier of any of the following at the place where ants enter the house: cinnamon, cream of tartar, red chili pepper, salt, dried mint, sage, or cucumber peelings. Also, try that old gift perfume you don't like. Some perfumes may kill or repel ants.
- Mix 1 tablespoon sugar and 1 tablespoon borax with 2 tablespoons water to make a thick syrup. Soak cotton balls in mixture and place them on something flat so that ants can get to it. Place in the middle of the ant infestation. Ants will eat it and take it back to the nest. Slowly but surely, the numbers will diminish. Keep out of reach of children and pets.
- Border gardens with bone meal or diatomaceous earth.
- Mix 4 ounces of mint jelly with 2 level tablespoons of powdered boric acid. Cut small squares of masking tape and dab mixture on tape. Stick on floors and behind cabinets and appliances. Take precautions for children and pets.

## **Aphids**

- Some soap sprays are effective insecticides. They must be sprayed directly on the insect in order to penetrate its body. Mix 1 teaspoon liquid soap in 1 gallon water. Try different soaps; some may be more effective than others. Use on aphids, mealy bugs, whiteflies, earwigs and scales.
- Introduce ladybugs or lacewigs, natural enemies of aphids.
- Plant garlic, chives, petunias and nasturtiums around garden to repel aphids, but be aware that some plants (garlic, for instance) may inhibit the growth of certain vegetable plants.

## **Mosquitoes**

- Burn citronella candles and plant natural repellents like tansy or basil near a door.
- Natural repellents like citronella oil, pennyroyal, or mint may be rubbed onto the skin.
- Do not eliminate natural predators such as dragonflies or the praying mantis.
- Eliminate pools of stagnant water and use mosquito traps instead of pesticides.



## **Moths**

- Destroy all forms of the moth by dry-cleaning or washing garments; kill moth eggs by running clothes through a warm dryer.
- Chicago-area weavers and spinners use ½ lb. rosemary, ½ lb. mint, ¼ lb. thyme, ¼ lb. ginseng and 2 tablespoons cloves. Mix and put in cheesecloth bags for use similar to sachet. Helpful when fresh.
- Hang or place fresh sachets of any of the following with stored clothes: dried lemon peels, dried lavender, bay leaves, whole cloves, cedar chips, dried rosemary and mint, or whole peppercorns.

## **Roaches**

- Set out dishes with equal amounts of oatmeal flour and plaster of paris, or equal amounts of baking soda and powdered sugar, or equal amounts of borax and brown sugar. Keep out of reach of children and pets.
- Caulk cracks; close off all gaps around pipes and electric lines where they enter the house by using screening or cement.
- Place bay leaves around cracks in room; do not leave exposed food or pet food out overnight.

## **Snails and Slugs**

- Set out a bait of stale beer, spoiled yogurt, or a mixture of yeast and water in saucers or tuna cans. Bury with the lip of container level with the ground, so pest will fall in and drown. Put a raised cover over the trap to keep rain from diluting the beer and keep large animals from drinking.
- Slugs cannot cross a 3-inch barrier of copper. Cut sheet copper to size and attach to raised beds or planters. This method also keeps slugs in, so be sure to remove any slugs first. Apply banding vertically (like a fence) rather than horizontally (like a floor). The copper remains effective after it turns green.

### **Toilet Bowl Cleaners**

- Scrub with a solution of ½ cup borax in 1 gallon of water for cleaning and disinfecting.
- Clean frequently with solution of baking soda and water; sprinkle baking soda around rim; scrub with toilet brush as needed.
- Mix ½ teaspoon sodium lauryl sulfate, 2 tablespoons baking soda, 2 tablespoons vinegar, 1 teaspoon orange essential oil (optional), 2 cups water; vinegar and baking soda will foam when mixed, let stand for 10 minutes before use as spray.
- To remove lime deposits, pour full strength white vinegar in the bowl, let sit for several hours then scrub with sturdy brush.

### **Tub and Tile Cleaners**

- Use a non-chlorinated scouring powder or baking soda.
- To clean grout, combine 3 cups of baking soda and 1 cup warm water and scrub into grout; rinse well with water.
- Use ½ cup borax to 1 gallon of hot water for cleaning and as a disinfectant.
- To clean soap film off fiberglass surfaces, apply baking soda with a damp cloth, rub and rinse residue off well.
- To clean shower-door tracks, pour full-strength vinegar into the track, let soak for a few minutes and rinse.
- Scrub tub and sink stains with a paste made from cream of tartar and hydrogen peroxide.

### **Upholstery, Rug and Carpet Cleaners**

- Use a non-aerosol, soap-based cleaner.
- Clean spills immediately with club soda.
- Mix 1 quart water, 1 teaspoon mild liquid soap, 1 teaspoon borax or TSP (trisodium phosphate) product, and a squeeze of lemon juice or splash of vinegar; apply with a damp cloth or sponge and rub gently; wipe with clean cloth and allow to dry.
- Mix 4 cups water, 1 cup white vinegar, 3 tablespoons sodium lauryl sulfate, 2 tablespoons baking soda, 1/8 teaspoon lavender essential oil (optional), 1/8 teaspoon ginger essential oil (optional); shake mixture vigorously and shampoo using small circular motions; scrub sudsy area well.
- To clean red wine spills, rub a thick layer of salt on the spill, then sponge up after the spill has been absorbed.

### **Drain Openers**

- To unclog a drain, pour ¼ cup of baking soda down the drain, followed by ½ cup of white vinegar. Let sit for a few minutes, then pour a kettle of boiling water down the drain to flush.
- Pour ¼ cup of salt down the drain, followed by boiling water, to help keep drains unclogged.
- Pouring boiling water down the drain once a week can keep it from getting blocked.
- To prevent clogged drains, always use a drain strainer.
- Use a mechanical snake or plunger to unclog a drain.

### **Laundry Products**

#### **Bleach**

- Use non-chlorine dry bleach or washing soda to whiten clothes.
- Reduce bleach in half and add ¼ to ½ cup baking soda per load.
- Use ½ cup borax per load of laundry to whiten and brighten colors and to remove spots.

#### **Detergent**

- Use a synthetic detergent without adding fabric softeners or bleach.
- Use products that contain washing soda. Washing soda brightens fabrics and costs less than bleach.
- Mix ¼ cup clay powder, 1-3 tablespoons of essential oil of choice (optional), 13 cups borax, 12 cups baking soda, 4 cups sodium lauryl sulfate; mix well in bucket and use 1/8 cup of laundry powder per load.

#### **Fabric Softener**

- To freshen and soften clothes, add 1 cup of vinegar or ¼ baking soda during final rinse.
- To reduce “static cling” in synthetics due to tumble-drying, dampen hands when folding.
- Use non-perfumed fabric softener sheets rather than liquid fabric softener.

#### **Spray Starch**

- For regular fabrics, dissolve 2 tablespoons cornstarch in 1 pint of cold water; store in spray bottle; shake well before using.
- For delicate fabrics, dissolve a packaged unflavored gelatin in 2 cups hot water; store in spray bottle. To test solution, tip corner of fabric into solution; if fabric becomes very sticky when dry, add more water.



## Spot and Stain Removers

- Dissolve  $\frac{1}{4}$  cup borax into 2 cups cold water; sponge on and let sit until dry then wash with soap and water to completely remove spot. Works well on blood, chocolate, coffee, mildew, mud and urine.
- To remove bloodstains: (1) Immediately clean stain with club soda or sponge with cold water; dry with towel, repeat if needed. (2) Rub with cornstarch or cornmeal and water paste; let dry in sun; brush off. (3) If stain persists after cleaning with club soda or cold water, then pour hydrogen peroxide directly on stain; rinse with water and wash as usual or apply mixture of  $\frac{1}{4}$  cup borax and 2 cups cold water, rinse and wash.
- To remove grease: (1) Apply paste of cornstarch and water; let dry then brush off. (2) Cover with baking soda or cornmeal; let dry and brush off. (3) Sponge spots on suede with white vinegar; let dry and brush off. (4) Scrub spot with toothpaste.
- To remove lipstick, rub with cold cream or shortening to dissolve color; rinse area with solution of washing soda and warm water to remove grease; wash in soapy water as hot as fabric will stand.
- To remove rust stains, moisten spot with lemon juice, sprinkle with salt and expose to sunlight. To remove rust from whites, cover the stains with cream of tartar, gather up the ends of the article so the powder stays on the spot, dip the whole thing in hot water for 5 minutes, then wash as usual.
- To remove wine and food, pour club soda on fresh spots and stains.
- To remove ink spots, put cream of tartar on stain and squeeze a few drops of lemon juice on top; rub into stain for one minute and brush off powder with a clean brush and then sponge immediately with warm water. Repeat if needed.

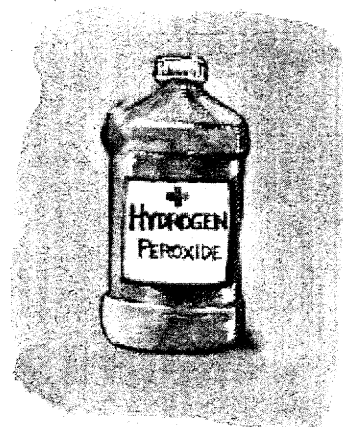
## Polishes

### Floor Polish and Wax

- Wood floors sealed with polyurethane can be cleaned with  $\frac{1}{4}$  cup white vinegar added to 1 gallon of water; dry immediately.
- For painted or finished wood floors, combine 1 teaspoon washing soda and 1 gallon hot water; wash floors with a rag dampened with mixture; dry immediately.
- To clean vinyl floors, combine  $\frac{1}{4}$  cup TSP,  $\frac{1}{4}$  cup white vinegar with 1 gallon warm water and apply with mop to remove dull greasy film.
- To clean wood floors, mop with mild vegetable oil soap and water; dry immediately.

### Furniture Polish

- Polish unfinished wood with mineral oil.
- To clean and polish finished wood: (1) Use a mild vegetable oil soap. (2) Combine 1 part lemon juice with 2 parts vegetable or olive oil and polish with a clean, soft cloth.
- To polish dark wood, mix 1 teaspoon olive oil, juice of 1 lemon, 1 teaspoon brandy or whisky, and 1 teaspoon water; mix and apply with soft cloth. Must be made fresh.
- To polish oak furniture, boil 1 quart beer with 1 tablespoon sugar and 2 tablespoons beeswax; when cool, wipe mixture on wood, allow to dry and then polish with soft cloth.
- To remove a heat blemish or scratch, rub in mayonnaise, wipe off, then buff with clean cloth.
- Wash painted wood with 1 teaspoon washing soda in 1 gallon hot water; rinse with clear water.
- To remove water spots, apply equal parts non-gel toothpaste and baking soda with a soft, damp cloth; rinse out the cloth and wipe off any residue. When the finish is smooth, buff with a clean soft cloth then rub the spot with the meat of half a pecan to restore color and shine.



### Metal Polishes

- To polish brass: (1) Use Worcestershire sauce or scrub with toothpaste. (2) Pour on tomato ketchup, let sit and wipe dry. (3) Use water in which onions have been boiled. (4) Use a lemon juice and salt paste.
- To polish copper, pour white vinegar and salt over copper and rub.
- To polish silver, soak silver about 5 minutes in 1 quart of warm water containing 1 tablespoon baking soda, 1 tablespoon salt and a piece of aluminum foil.
- To polish chrome: (1) Wipe with apple cider vinegar, rinse with water, then dry. (2) Shine chrome fixtures with baby oil and a soft cloth, a piece of aluminum foil (shiny side out), or newspapers.

### Shoe Polish

- Avoid products containing trichloroethylene, methyl chloride, nitrobenzene and mineral spirits.
- For leather shoes: (1) Apply olive oil, walnut oil or beeswax to shoes then buff with a chamois cloth. (2) Polish black or tan leather shoes with lemon juice then buff with a clean cloth. (3) To clean leather, rub equal parts of white vinegar and linseed oil into leather then buff with soft cloth. (4) To shine and protect patent leather shoes, rub with a dab or petroleum jelly.
- To clean dirt marks from suede, rub with an art-gum eraser then buff lightly with sandpaper or an emery board.