

WHAT'S UNDER YOUR SINK?

POTENTIAL HAZARDS OF HOME CLEANING PRODUCTS



Photographer: Thomas Widmann.

ASTHMA AND RESPIRATORY DISORDERS: WHAT YOU SHOULD KNOW ABOUT YOUR HOUSEHOLD CLEANING PRODUCTS

How clean is clean? Americans have become increasingly concerned about their exposure to germs and the diseases they may cause. Advertisements tell us of new and improved products which will protect our family's health by killing germs found on every surface we may touch. Unfortunately, such advertisements fail to mention that many cleaning products contain chemicals that may actually be harmful to our health. Certain chemicals in common cleaning products have been associated with increased prevalence of asthma, exacerbations of asthma symptoms, and respiratory ailments including:

- ❖ Monoethanolamine (MEA), a surfactant found in some laundry detergents, all-purpose cleaners and floor cleaners that is a known inducer of occupational asthma;
- ❖ Ammonium quaternary compounds, disinfectants found in some disinfectant sprays and toilet cleaners that have been identified as inducers of occupational asthma; and
- ❖ Phthalates, carriers for fragrance in glass cleaners, deodorizers, laundry detergents and fabric softeners, that are linked to increased allergic symptoms and asthma in children.

Asthma is a growing health condition in the United States, particularly among children:

- ❖ The incidence of asthma is rising in the U.S. An estimated 20 million people, including 6.1 million children, have asthma.¹ Asthma accounts for more than 14 million outpatient clinic visits and nearly 2 million emergency room visits each year.²

- ❖ Asthma is the most common serious chronic childhood disease, and is the third-ranking cause of hospitalization of children under age 15.³
- ❖ A 2004 report from the National Center for Health Statistics states that the incidence of asthma among preschool-aged children rose by 160% between 1980 and 1994,⁴ accounting for 14 million missed school days each year and \$3.2 million in treatment expenses.⁵
- ❖ According to the Centers for Disease Control, an estimated 9 million children (12.5% of children, or one out of 13) under 18 years of age in the United States have had asthma diagnosed at some time in their lives.⁶

Cleaning product use has been shown to exacerbate or increase the incidence of asthma and respiratory effects in children:

- ❖ A 2004 study in the United Kingdom published in the journal *Thorax* found that frequent use of household products was associated with persistent wheezing among pre-school age children.⁷
- ❖ Other recent studies have shown that exposure to household cleaning chemicals increases the likelihood of asthma among children.⁸
- ❖ Past studies have also shown that institutional cleaning chemicals used in schools have impacts on asthma and other respiratory problems in school age children.⁹

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The incidence of occupational asthma in cleaning workers raises concerns about the use of these chemicals in household cleaning products

While there is scant research available on asthma in individuals caused by cleaning products they use in their homes, research on the incidence of occupational asthma among cleaning workers clearly demonstrates a link with exposure to cleaning chemicals.

- ❖ A January 2001 study published by the American Journal of Industrial Medicine reported that janitorial workers have twice the rate of occupational asthma than other workers.¹⁰
- ❖ In New York, a study of urban minority asthma sufferers revealed that 61% of individuals working in janitorial jobs reported exacerbations of their asthma symptoms associated with their workplace.
- ❖ In Spain, several asthma studies of more than 4,000 women highlight the impacts of working in the domestic cleaning industry. One study found that women who did (or had done) domestic cleaning work had a much higher prevalence of asthma than women who had never done domestic cleaning work. Researchers concluded that 25% of asthma cases seen in study participants were linked to domestic cleaning work.¹¹

Actions you can take to protect your family from exposure to chemicals in household cleaning products

- ❖ Look to see if the products you use are listed on the fact sheet, **Household Cleaning Products Containing Chemicals of Concern**, (or Appendix 1 of the report, *Household Hazards*). If your products are not on the list, use the 1-800 number on the product package to call the manufacturer. Ask for a list of product ingredients and encourage them to provide this information on product labels.
- ❖ While the presence of a chemical of concern in a product does not necessarily imply the product will cause harm, the potential health risks associated with exposure do present a concern. From a precautionary standpoint, if you or someone in your home is already affected by asthma, you may wish to avoid products containing these chemicals.

- ❖ Make your own effective, non-toxic cleaning products using simple and inexpensive ingredients like vinegar and baking soda.
- ❖ Buy only from companies that list all product ingredients on the package.
- ❖ Tell Congress to require companies to disclose all ingredients in household cleaners on product labels and to replace toxic chemicals with safer alternatives.
- ❖ Read WVE's fact sheet, "**WHAT YOU CAN DO: 7 Simple Steps to Help Reduce Your Exposure to Toxic Chemicals from Household Cleaning Products.**"
- ❖ To view the report, read a complete list of action items, download non-toxic cleaning recipes, and review a list of chemicals of concern in cleaning products, visit www.womenandenvironment.org.

(Endnotes)

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- 6 Dey AN, Bloom B. (2005). Summary health statistics for U.S. children: National Health Interview Survey, 2003. Vital Health Stat 2005;10(223). Available at www.cdc.gov/nchs/data/series/sr_10/sr10_223.pdf
- 7 Sherriff, A. et al. (2005). Frequent use of chemical household products is associated with persistent wheezing in pre-school age children. Thorax 2005; 60:45-49.
- 8 Rumchev, K. et al. (2004). Association of domestic exposure to volatile organic compounds with asthma in young children. Thorax 2004; 59: 746-751.
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- 10 F. Reinisch, R.J. Harrison, S. Cussler et al. (2001). Physician Reports of Work-Related Asthma in California 1993-1996. American Journal of Industrial Medicine 39, 1 (January 2001): 72-83.
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Women's Voices for the Earth
P.O. Box 8743
Missoula, MT 59807
Phone: 406/543-3747

www.womenandenvironment.org
wve@womenandenvironment.org