List of Xenoestrogens - Chemical Estrogens

Xenoestrogens are environmental hormone disruptors creating an imbalance with the body's hormones. Awareness of xenoestrogens and avoidance are key to sustaining health.

Xenoestrogens and Your Health

Xenoestrogens are foreign estrogens. They are estrogen mimickers that effect the estrogen in our bodies and can alter hormone activity. Growing evidence implicates xenoestrogens in a wide range of human and wildlife health problems.

There are some 70,000 registered chemicals having hormonal effects, in addition to being toxic and carcinogenic. The synergistic effects of exposure are well documented, but largely unknown. These substances can increase the estrogen load in the body over time and are difficult to detoxify through the liver.

It is now being discovered that these synthetic estrogens are making their way into our bodies and pretending to be our biological estrogen. They are present in our soil, water, air, food supply, personal care and household products.

List of Xenoestrogen Sources

- Organ chlorines, are one of the largest sources. They are used in pesticides, dry cleaning, bleaching of feminine-hygiene products and the manufacture of plastics.
- Bisphenol-A, a breakdown of polycarbonate, is used in many plastic bottles. It’s found in the lining of many food cans and juice containers.
- Avoid heated plastics, plastic lined items and Styrofoam (microwave, oven, sun), as the polycarbonate escapes
- Use glass, ceramics or steel to store/consume foods and liquids.
- Choose organic produce. Always go organic with thin skinned fruits and vegetables.
- Buy hormone-free animal products (eggs, poultry, meats, dairy). To avoid xenoestrogen injections, supplements, bovine growth hormone.
- A common food preservative in processed foods (BHS: butylated hydroxyanisole).
- Avoid non-organic coffee and tea. They are highly sprayed with pesticides.
- Use reverse-osmosis filter water or purchase your own filter (drinking and bathing).
- Many creams and cosmetics contain parabens and stearal konium chloride. Choose natural brands (preservatives made with minerals or grapefruit seed extract).
- Most skin lotions, creams, soaps, shampoo, cosmetics use parabens and phenoxyethanol as a preservative. Substances are 100% absorbed into the body. Go natural or organic.
- Phthalates are commonly found in baby lotions and powders.
- Sunscreen can contain benzophenone-3, homosalate, 4-methyl-benzylidene camphor, octal-methoxyycinamate, octal-dimethyl-PABA. Go organic.
- Many perfumes, deodorizers, air fresheners have artificial scents and contain phthalates.
- Most perfumes are petrochemically based.
- Nail polish and removers contain harsh chemicals.
• The birth control pill contains high concentration of synthetic estrogen. Choose a condom or diaphragm gels without surfactants. Use a condom without spermicidal.
• Hormone replacement therapy (contains synthetic estrogens) - opt for paraben-free progesterone cream.
• Research ingredients in your pharmaceuticals.
• Dryer sheets, fabric softeners and detergents put petrochemicals right on your skin. Use laundry detergent with less chemicals or use white vinegar and baking soda.
• Be aware of noxious gas that comes from copiers and printers, carpets, fiberboards, new carpets.
• Do not inhale and protect your skin from: electrical oils, lubricants, adhesive paints, lacquers, solvents, oils, paints, fuel, industrial wastes, packing materials, harsh cleaning products, fertilizers.
• Become educated on: pesticides, herbicides, fungicides, parathion, plant and fungal estrogens, industrial chemicals (cadmium, lead, mercury), Primpro, DES, Premarin-cemeteries, Tagamet, Marijuana, insecticides (Dieldrin, DDT, Endosulfan, Heptachlor, Lindane/hexachlorocychohexan, methoxychlor), Erythrosine, FD&C Red No 3, Nonylphenol, Polychlorinated biphenyls, Phenosulfothizine, Phthalates, DEHP.

The human body is being bombarded with these harmful chemicals every day creating an over burdened liver, weakening the immune system and disrupting the delicate hormonal balance.

More and more evidence exposes xenoestrogens to be dangerous chemicals that need to be avoided whenever possible. Avoiding these synthetic chemicals and supporting the body through proper liver detoxification, hormone balancing and immune support, will work towards protecting our bodies.

**Tips to Avoid Common Sources of Xenoestrogens**

1. **Agricultural Chemicals such as:** DDT, Atrazine, Endosulfan, and Methoxychlor
   • Eat organic foods as often as possible
   • Use natural pest control in your home and garden
   • Avoid synthetic flea shampoos, flea collars, and flea pesticides for your pets and home
   • If you must use synthetic pesticides or fertilizers, follow directions exactly.
   • Campaign against pesticide use in schools and workplaces. Children are especially susceptible to the effects of xenoestrogens.

2. **Meat, dairy and eggs: growth hormones fed to cattle, pigs, poultry, and other livestock**
   • Choose organic meat, eggs, and dairy products
   • Better yet, choose 100% grassfed meat and dairy products, and pastured pork and poultry
   • Reduce your consumption of animal products in general, especially uncultured dairy products

3. **Cosmetics and Toiletries**

   Xenoestrogens absorbed by the skin are ten times more potent than those taken orally, because they travel directly to the tissues instead of passing through the liver.

   Choose natural plant based products. Read the ingredients carefully! Some things to avoid are:
Nail polish and sunscreen are more common sources of xenoestrogens, including phthalates, benzophenone-3, homosalate, 4-methyl-benzylidene camphor (4-MBC), octyl-methoxycinnamate and octyl-dimethyl-PABA.

Other products, including body lotions, toothpastes, soaps, gels, hairsprays, and more may contain xenoestrogens in the form of parabens, phenoxyethanol, phthalates, and other compounds.

4. Plastics

Plastics, especially soft plastics, contain many compounds that are considered to be xenoestrogens. Phthalates, a type of plasticizer used to make plastics soft and flexible, are an especially common offender. These compounds can leach out or volatize over time or in response to heat or other stimuli. Phthalates are used in products from food storage containers and packaging to children's toys to certain clothing and footwear items to toiletries to pesticides to IV bags to baby bottles... the list goes on and on.

How To Avoid Them

- Use cling wrap that does not contain DEHA and replace cling wrap on meats and other foods as soon as you get home from the store. Wrapping in tin foil or storing food in ceramic or glass containers may be another option.
- Never heat food with plastic in the microwave, even if it claims to be microwave-safe. Use glass or ceramics instead and cover with a paper towel if needed.
- Avoid Teflon and other non-stick cookware. Cast iron is an inexpensive, durable, and healthful alternative.
- Buy bottled water and other drinks in glass bottles instead of plastic.
- Minimize consumption of foods from tin cans. In the USA, over 85% of tin cans are lined with bisphenol-A (BPA) to reduce the metallic taste that can be present in canned foods. Unfortunately, BPA is a known xenoestrogen that leaches when exposed to heat, such as the sterilization process some cans undergo, or acid. BPA is also present in many plastic baby bottles, food storage containers, and other products.
- Don't drink hot liquid or eat hot food from Styrofoam cups or containers.
- Choose safer plastics if you need to eat or drink from them!

Safe plastics are: HDPE, LDPE, PP

Plastics to avoid are: PVC, PS, OTHER

4. Household Cleaners

Many household cleaners contain xenoestrogens. Particularly dangerous are laundry detergents and fabric softeners, because residues on clothing, towels, and other items are worn against the skin.

Air fresheners and insect repellents are also major sources of xenoestrogens.
How to Avoid Them:

- Use old-fashioned household cleaners like baking soda, Borax, and vinegar whenever possible.
- Avoid fabric softeners and dryer sheets.
- Use a simple laundry detergent with few chemicals.

5. Water

Unfortunately, water treatment plants are not currently designed to remove hormonal pollutants, and agricultural and pharmaceutical runoff have created a curious epidemic among fish and frogs in many waterways in the developed world. These aquatic creatures are actually **switching gender** due to high levels of effluent estrogen in their watery homes!

Although human bodies are more complex than frogs and fish, the hormonal pollutants can affect us as well when we drink or bathe in water containing them.

Water in many parts of America is also contaminated with agricultural runoff, including many pesticides and fertilizers containing xenoestrogens, and urine and manure from animals fed growth hormones.

How to Avoid Them:

Don't switch to bottled water, which is unregulated and may be more polluted than tap water. Instead, install a reverse osmosis water system. These can include under sink or whole house systems.

*Choose safer plastics if you need to drink from a plastic water bottle! See #4

6. Air Fresheners and Insect Repellants

Air fresheners and insect repellents are major sources of xenoestrogens, cancer causing hormone disruptors!

How to Avoid Them:

- Ventilate your house frequently and well and avoid the use of air fresheners, insecticide foggers, and other products that release chemicals into the air.
- Eat lots of antimicrobial herbs and foods high in B-vitamins, especially vitamin B1 - these are natural insecticides.

Try these safer natural herbal insect repellants:

- **Citronella** – If the word citronella makes you think of tiki torches, the people at the candle companies are doing their jobs right. But citronella isn’t just for candles. You can wear it, too. Citronella is an essential oil derived from lemongrass, and it’s one of the most beloved mosquito repelling substances around (mosquitoes were apparently not included in that unscientific survey).
• **Lavender** – While lavender is an almost universally loved fragrance among humans, bugs just hate it! Lavender is great for repelling flies, mosquitoes, gnats, and other pests. You can even rub some lavender oil on your pets to help prevent fleas.

• **Cedar** – While cedar chests and chips have long been used to repel months, most people don’t realize this fragrant wood is equally effective against mosquitoes and other biting insects. No, you don’t have to climb inside of a cedar chest or hang a block of the stuff around your neck. Just get your hands on some cedar essential oil.

• **Lemon Eucalyptus** – If you want to repel koalas in the Australian outback, eucalyptus definitely won’t work, but it’s great for chasing away mosquitoes. Bonus: it’ll also clear your sinuses.

• **Peppermint** – Misting peppermint oil onto your skin is a nice, cool, refreshing treat in the summertime. It doesn’t hurt that pests, such as like mosquitoes and fleas, hate the smell.

• **Basil** – Do you love pesto? Despite the name, mosquitoes do not. Slather yourself in the scent of basil and – presto pesto! – you’ll be pest-free!

• **Geranium** – Plant geraniums around your property to keep nasty bugs away, or get an extract of the plant to wear.

• **Feverfew** – Add these pretty daisy-like flowers to your garden to repel a variety of pests. It can also be worn as a spray, or even used to treat insect bites.

• **Catnip** – Concentrated catnip has been shown to be more effective than DEET at repelling mosquitoes. Just watch out when traveling through neighborhoods with a lot of stray cats …

• **Rosemary** – The oil of this fragrant wood makes a very effective mosquito repellent. It’s good in soup, too.

• **Neem** – A type of mahogany grown in India, neem is one of the most effective insect repellents around. Many commercial insect sprays use neem as the main active ingredient.

Any of these herbs or woods can be purchased in essential oil form, or you can make your own extracts. Just crush the plant and soak it in three parts alcohol per one part of solid material. Bottle it up and let it sit for a few weeks before using.

Sources:

