

The Quickest, Easiest Way to Help Detoxify Your Body

By [Dr. Mercola](#) | January 26 2011



Unfortunately your body is under constant daily assault by toxic substances, a great many of which are hard or impossible to completely avoid.

Besides the industries that pump or dump known toxins into your air, food and water, there are also synthetic chemicals in most products on your supermarket shelves.

"Better living through chemistry" really has become the accepted standard for our modern world.

But as we are learning the hard way through the explosion of degenerative diseases in the modern world, many chemicals, especially man-made ones, can do much more harm to your body than good!

In my opinion, one of the biggest hazards to your health comes from something you are likely taking for granted.

The water you drink, the water you bathe in, and the water you run through your appliances. It is vitally important for you to secure a good, clean source of water, and this is easily done by installing one or more types of water filtration systems in your house -- I will talk more about that in a minute.

Your Body Is Mostly Water

On a percentage basis your body is over 99 percent water, or hydrogen and oxygen atoms.

Your body requires a constant daily supply of water to fuel all the various waste filtration systems nature has designed to keep your body healthy and free of toxins. Your blood, your kidneys, and your liver all require a source of good clean water to detoxify your body from the toxic exposures you come into contact with every day.

When you give your body water that is filled with toxins leached from plastic, or filled with by-products from chlorination, or with volatile organic compounds, or water that is contaminated by pesticides or hormones, you are asking your body to work twice as hard at detoxification, because it must first detoxify the water you are drinking, before that water can be used to fuel your organs of detoxification!

Clearly, the most efficient way help your body both avoid and eliminate toxins is to provide your body with the cleanest, purest water you can find. And that may be more of a challenge than you think.

The Problem with Modern Well Water

Unless you are getting your water from a well that is located 800 feet or more below the ground surface, chances are your well water has been contaminated by some if not many toxic substances that have been dumped into the ground soil over the past many decades.

Some common toxins that are dumped by the millions of pounds into soils every year are:

- Herbicides
- pesticides
- estrogen mimicking hormones
- drug residues
- heavy metals

In fact, you'd be hard pressed to find a natural well in America that hasn't been affected by some type of chemical or heavy metal runoff from the surrounding ground soil.

This is to say nothing of the microorganisms living in well water. No matter how clean or pure your natural ground water looks, this has nothing to do with potential bacterial contamination or toxic pollution in the water. Many of the offenders in well water are just much too small to be seen with the naked eye.

If your home uses well water, you really need to test to see what unwanted contaminants you're piping into your house. As you will see below, the problem isn't just that you may be drinking contaminated water; you're also inhaling it and absorbing it through your skin directly into your bloodstream.

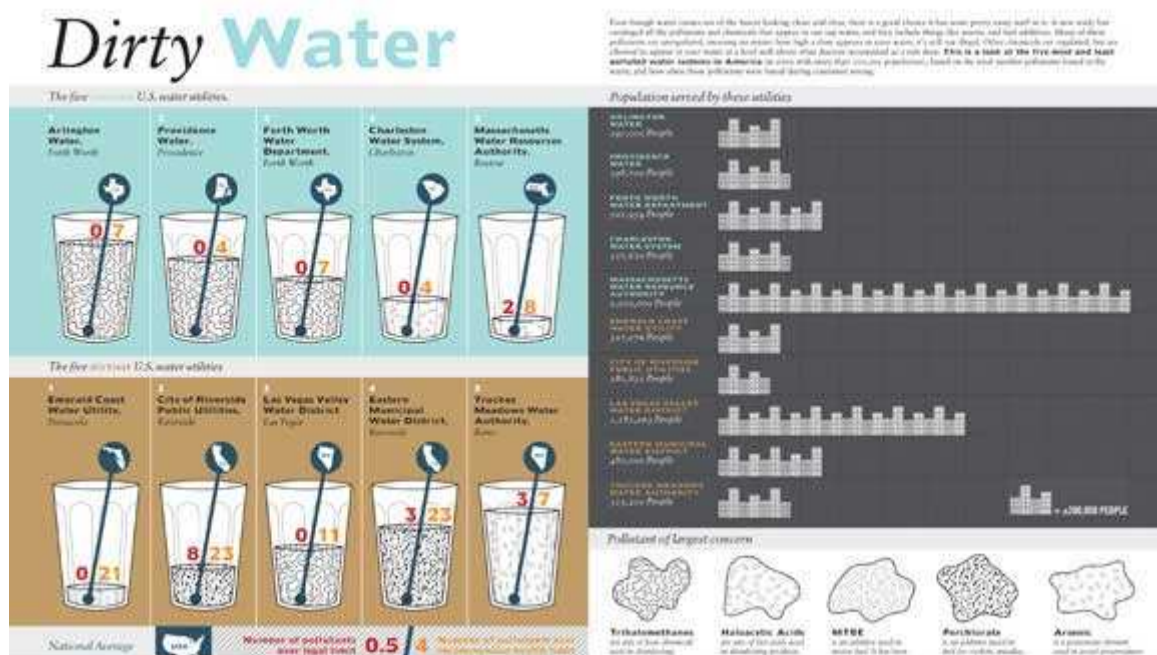
The Problem with Government Mandated Urban Water Treatments

If you live in a city and rely on the local water processing plant to provide you with clean water, I have some disturbing news for you: You simply cannot trust municipal sources or government agencies to keep your water clean.

[Sen. Frank Lautenberg, D-N.J. recently told ABC News that there are more than 140 chemicals in U.S. drinking water supplies that are not regulated by the EPA.](#) This includes, gasoline, pesticides, rocket fuel, [prescription drugs](#) and more.

Further, more than 20 percent of U.S. water treatment systems have [violated key provisions of the Safe Drinking Water Act](#) over the last six years, yet fewer than six percent of the violations were ever fined or punished! This is to say nothing of the violations that go unnoticed in this time of budgetary restraints and lack of regulation and oversight!

You can get a good idea of what types of contaminants could be in your drinking water right now by [viewing this awesome graphic from GOOD Environment](#) (reprinted with permission.)



It gives you a look at the five most and least polluted water systems in America (in cities with more than 100,000 population), including pointing out the pollutants of largest concern.

Adding to the problem are numerous outdated and overwhelmed sewer systems, many of which were built more than a century ago. In 1972, the Clean Water Act was enacted to upgrade many U.S. sewer systems, yet despite updates made in the '70s and '80s, many sewer systems are still overwhelmed and are functioning at less than optimal levels.

Is there Sewage Spilling into Your Drinking Water?

As a result, sewage spilling into waterways is a common occurrence. In fact, the *New York Times* reported that in the last three years more than [9,400 of the 25,000 U.S. sewage systems have violated the law](#) by dumping untreated or partially treated human waste, chemicals and other hazardous materials into rivers, lakes and other waterways.

Some natural lakes and bodies of water are now either approaching "dead", unable to support life, or are dead. And these dead bodies of water continue to be the source of drinking water for millions of people!

Male frogs and bass are now found in nature with ovaries growing on their testes, and seven year-old girls are now reaching sexual maturity. Scientists have linked both of these phenomenon to the estrogen mimicking hormones now commonly found in our lakes, streams and drinking supplies.

Nearly every municipal water supply also has [fluoride](#) (a highly toxic poison) added during water treatment, which is detrimental to your health. Europeans have known for many years that fluoride is toxic and have long since removed it from their water supplies, but it still is used in the United States.

And then there are [disinfection byproducts, or DBPs](#). If you have not heard of DBPs before, you need to pay close attention as it turns out that DBPs, not chlorine, are responsible for nearly all the toxic effects of chlorinated water. Chlorine by itself is relatively harmless, but its side effects, by producing DBPs, cause nearly all of the problems -- including reproductive disorders and cancer.

So when you help yourself to a glass of water from your kitchen faucet, it may look much more pure than it actually is.

The Hazards of Chlorinated Water: Disinfection Byproducts (DBPs)

The main chemical used to disinfect the tap water you receive at your house is chlorine. While your local government is quick to assure you that there is relatively no danger from drinking chlorinated water, that simply is not the case, because the levels of chlorine disinfection byproducts (DBPs) that are produced by this process are both dangerous and alarming.

There is actually no safe level for many things found in drinking water, including heavy metals, pesticides, herbicides, hormones and DBPs. The truth of the matter is it would cost the government trillions of dollars to provide truly clean water into the pipes of your house.

The resources to provide this just aren't there. It never has been and it probably never will be, especially with the downturn in the US economy.

The government is much more concerned with providing water that doesn't kill you through diarrhea and it does a good job at that, although some microorganisms (cysts and parasites) do survive the chlorination process (cryptosporidium, Giardia, for instance) and can lead to isolated outbreaks of disease and even death to those with compromised immune systems.

If you have not heard of DBPs before, you need to pay close attention as it turns out that DBPs, not chlorine, are responsible for nearly all the toxic effects of chlorinated water. Chlorine by itself is relatively harmless, but its side effects, by producing DBPs, are what cause nearly all of the problems.

As it turns out, DBPs are over **10,000 times more toxic than chlorine**, and out of all the other toxins and contaminations present in your water, such as fluoride and miscellaneous pharmaceutical drugs, DBPs may be the absolute worst of the bunch.

The most common disinfectant byproducts formed when chlorine is used are:

- trihalomethanes (THMs)
- haloacetic acids (HAAs)

The EPA takes the dangers of THMs -- which are measured in parts per *billion* -- very seriously and regulates these compounds. The maximum annual average of THMs in your local water supply cannot exceed 80 ppb (parts-per-billion), and the maximum annual average of HAAs permitted by EPA regulations is 60 ppb.

However even though these are allowed, ideally it would be best to have zero. These levels have been regularly adjusted downwards over the years as science progresses and gain a deeper appreciation of their true toxicity. If you are like me and obtain your water from a private well, then DBPs are a non-issue as they are only produced when chlorine is added, and it's highly unusual to add chlorine to most all private well water systems.

How Can DBPs Harm Your Health?

Trihalomethanes (THMs) are Cancer Group B carcinogens, meaning they've been shown to cause cancer in laboratory animals.

DBPs have also been linked to reproductive problems in both animals and humans, and human studies suggest that lifetime consumption of chlorine-treated water can more than double the risk of bladder and rectal cancers in certain individuals.

One such [study](#) found that smoking men who drank chlorinated tap water for more than 40 years faced double the risk of bladder cancer compared with smoking men who drank non-chlorinated water. A second [study](#) found that rates for rectal cancers for both sexes escalated with duration of consumption of chlorinated water. Individuals on low-fiber diets who also drank chlorinated water for over 40 years more than doubled their risk for rectal cancer, compared with lifetime drinkers of non-chlorinated water.

As the vast majority of the U.S. population continues to receive and consume disinfected or chlorinated drinking water, we can assume that Americans are consuming disinfection byproducts every single day, and the number of related cancer cases could be substantial.

Drinking Chlorinated Water is not the Only Health Concern

But the sad truth is, the chlorine, DBPs, and toxic chemicals found in your urban water supply also pose a health threat to your *lungs*, and it can damage your *appliances*.

Why?

Because when you heat the water, in your shower, your bath, your dishwasher or your sink, you are releasing chlorine, DPBs, volatile organic compounds (VOCs), pesticides, herbicides – all of it – into the *air* you breathe! And onto your skin, your body's greatest tool for absorbing chemicals. It's true. By taking a seven-minute shower you are exposed to more chlorine, DPBs, and VOCs alone than by drinking a gallon of tap water.

And this is significant for two reasons:

- The chlorine that enters your lungs is in the form of chloroform, a carcinogen, and chlorite, a byproduct of chlorine dioxide. These forms of chlorine hit your bloodstream instantly before they have a chance to be removed by your organs of detoxification.
- The DBPs that enter your body through your skin also go directly into your bloodstream. And the warm or hot water maximizes absorption by your skin. So unless you are regularly taking one minute cold showers, your body is like a sponge for these airborne toxins every second you spend in a shower.

In fact it's estimated that only five percent of all volatile organic compounds make it down the drain of your shower. The other 95 percent are sent into the air you breathe, or directly into your bloodstream.

By the way -- bathing in municipal tap water is not a solution to avoiding the damage done in the shower, because the hot water on your skin facilitates absorption, and your skin is drinking in all those harmful DPBs every second that you lay luxuriating in that hot bath.

Now, this is painful news to a lot of people. Because you don't really want to look at your shower as your home's greatest source of toxic indoor pollution, do you? For some people, that long morning shower or that luxurious nighttime bath is one of the highlights of your day!

Additionally, the chlorine and DPBs are not great for your skin and hair, either. You know how you feel after you swim for even a little while in a chlorinated pool? The dry skin, the red eyes, the damaged hair – all of this chemical damage is going on in your home's shower and bath as well!

And the harsh chlorine and disinfection byproducts that assaults your skin in the bath or shower is also doing unnecessary damage to your appliances!

Your dishwasher, hot water heater, sinks, tubs, faucets, toilets and washing machine all have metal parts that chlorine, a harsh oxidizer, will actually slowly eat away with every drop of water. So another reason to eliminate the chlorine and disinfection byproducts is to minimize the damage you are doing to your appliances, which will help them last longer and let you avoid costly repairs that you could have prevented by filtering the water coming into your home.

The Danger of Radon in Your Home's Water

Besides inhaling chlorine and disinfection byproducts sent airborne by your hot shower, you also may be inhaling and absorbing radon, an odorless, radioactive gas. According to the United States Environmental Protection Agency, radon is the second most frequent cause of lung cancer, after cigarette smoking.

Radon is currently found in one third of all water supplies in America. That's right, you have a one in three chance of having this byproduct of decaying uranium going onto your skin and into your lungs every day -- if you are one of the unfortunate people with this poison in your water supply.

I would encourage you to spend the money necessary to test for this poison if you get your water from an underground well. Most municipal water supplies do not contain radon.

How You Can Avoid All of These Assaults on Your Health

If you would like to have your water tested, the most comprehensive test kit I recommend is from National Testing Laboratories. We have these test kits available at cost, a significant discount from the standard online price. If you're interested, you can purchase a test kit for [Well Water](#) or for [City Water](#).

If you could only afford one filter there is no question in most experts minds that the shower filter is the most important product to buy for water filtration, even more important than filtering your tap water. This is because the damage you incur through your skin and lungs far surpasses the damage done by drinking water (which at least gives your body a fighting chance to eliminate the toxins through your organs of elimination).

An even better solution to the problem of harsh chemicals and toxins in your home's water supply is to install a whole house water filtration system. This not only protects your body, but also your appliances as well.

There's just one water line coming into your house. Putting a filter on this is the easiest and simplest strategy you can implement to take control of your health by ensuring the water and the air in your house is as clean as possible.

Just remember, if you are getting your water from a municipal source your indoor air quality, especially in the winter when your windows are closed, is likely atrocious. This is related to the chlorine and other toxins evaporating from all your toilet bowls, showers, baths, dishwashers and washing machines.

My advice for whole house filtration systems is as follows: Find a system that uses at least sixty pounds of filter media and can produce eight or more gallons a minute. When you are running two different showers, the dishwasher and the kitchen sink at the same time, you'll find out why these minimum levels are so important.

Now, this recommendation covers a home or apartment up to 3200 sq./ft, or in other words, a residence with about three and a half bathrooms. For more than that you will probably require two whole house water filtration systems.

You also need to look for a whole house water filter that has three separate stages of contamination removal:

- Stage one removes sediment.
- Stage two removes chlorine and heavy metals.
- Stage three should be a heavy-duty carbon filter for removing hormones, drug residues, chemicals, pesticides, and herbicides.

You want to look for granular carbon in the carbon filter, not a solid block of carbon. The granular carbon allows for better water flow, which translates to more water pressure and better filtering properties as well.

You also want to look for NSF certification, which ensures your water filter is meeting national standards. NSF certification is not given before a product can prove it removes everything it claims to remove. It's also good to make sure all particles under .8 microns are

being filtered out of the water. A lower number is actually better, but .8 microns is the standard I recommend because that covers most bacteria, viruses and VOCs.

A Question about Tap and Shower Filters

One natural question that arises from my recommendation is if you invest in a whole house filtration system, do you also need a drinking water filter and a shower filter?

The answer is: It depends.

Many people's home and apartments have older plumbing, which can lead to heavy metals getting into your water supply even after your whole house filter has already filtered the water. Even newer plumbing regulations allow for some lead as part of the pipe construction, so if you have brand new pipes you are still exposed to lead getting into your home's water, just not as much as was previously allowed. And there is no safe level of lead exposure.

If you want to be absolutely certain you are getting the purest water you can, you want to filter the water both at the point of entry and at the point of use. This means filtering all the water that comes into the house, and then filtering again at the kitchen sink.

Since the whole house filter will remove 99.99 percent of the chlorine and DBPs before they reach your shower, and 100 percent of VOCs, you probably can skip the shower filter if you get a whole house filter, unless you are concerned about the metals in your house pipes getting onto your skin and hair. I personally prefer to filter at both point of entry and point of use, but this might be cost prohibitive for some people.

Unlike the shower filter, the whole house filter typically uses 60 pounds of carbon filter material, and moves cold water through the filter much at a much slower rate than the shower filter. So the whole house filter is going to remove 99.99 percent of the things you don't want, while the shower filter is going to remove only about 70 percent of the chlorine, DPBs and VOC's, because that filter only has about two pounds of carbon filter material, and it's treating hot instead of cold water.

As far as the kitchen tap, if you are using reverse osmosis as your source of filtering, it is also going to processes cold water more slowly, so you will be able to get the 99.99 percent removal rate from the kitchen tap filter. But remember the hot water in the shower is still allowing about 30 percent of the DPBs into the air you breathe and onto your skin, which does far more damage than drinking unfiltered tap water.

This is why I recommend a high quality whole house filtration system.

The only instance where I recommend the tap and shower filter but not the whole house filter is for people living in an apartment building with a municipal water supply. Chances are you aren't running that much water through your own appliances or faucets, and you may not have access to install a whole house filter in the first place. Treating your point of use water in this instance is probably the most cost effective.

Some Final Thoughts about Your Personal Water Supply

Your shower and tap are not the only source of potential environmental toxins in your home; water is also evaporating from your toilet every minute and sending chloroform and VOCs into the air you breathe.

And the water you put in your pet's bowl is filled with the same harsh toxins you are exposing yourself to, and your pets are a whole lot smaller. One cup of water in your body is proportionally much smaller than one cup of water in your pet's body. This goes for your children as well. Their smaller size means each gallon of water they are exposed to represents a much larger percentage of their body weight.

Your houseplants also do not like chlorine and byproducts of chlorination and VOCs. If you have trouble keeping your plants thriving, it may be because ordinary tap water is damaging their health.

Lastly, the single highest source of calories in America is high fructose corn syrup, primarily from soda. The average American is now drinking one gallon of soda a week! If you are not familiar with all of the health problems linked to high fructose corn syrup, you owe it to yourself to get [some education on this subject](#).

And diet sodas are no better! [Artificial sweeteners are just another poison you don't want inside your body!](#)

The most important health recommendation I can make for most people is to replace soda or diet soda with the purest, cleanest water you can find. And finding pure water is a lot harder than many people imagine! If you are spending your money on bottled water, you may be throwing that money away. [Bottled water is actually less regulated than common tap water; you can never be certain what will be in it.](#)

So one of the easiest ways to take control of your health is to control the water coming into your house. Make sure the water you are drinking, bathing in and breathing in your indoor air is clean! You can do this with a whole house water filter, a shower filter and a tap water filter, or a combination of these that makes the most sense for your residence and your budget.

The fact is, you need high quality clean water if you are ever going to become healthy, or stay healthy. And the more alcohol or caffeine or soda you take into your body, the more water you are going to need. So cutting down on any of these beverages and replacing them with equal amounts of water is one of the best investments in your health that you can make.