# **WebMD**

# **The Truth About Triclosan**

By Barbara Brody

You're in the drugstore trying to decide which bottle of liquid hand soap to buy: One's says it's "antibacterial," and the other doesn't. Does it matter which one you choose?

Pretty soon, you won't have to make a choice. The FDA has decided that soaps and other antiseptic wash products made with triclosan can no longer be marketed in the U.S. That rule goes into effect in September 2017, so until then, you may still see some antibacterial products with triclosan in stores.

In the meantime, if you choose the antibacterial soap, you probably hope that it will give you extra protection against germs. Unfortunately, there isn't a lot of science to back that up. And the active ingredient in many antibacterial products, triclosan, has some potential drawbacks.

The U.S. government isn't the first to prohibit the use of triclosan in over-the-counter soaps.

Concerns about it have previously prompted the European Union to ban triclosan in personal care products. Minnesota also decided to ban antibacterial soaps and body washes made with triclosan.

The controversy isn't so much about what happens when you wash your hands today. It's more about the big picture of what could happen in the long run.

### What Is Triclosan?

First made as a pesticide, triclosan has been around since the 1960s. In recent years, it made its way into a wide range of personal care items.

Triclosan is best known for its germ-killing power. That's why it has been used in so many hand soaps and body washes.

In water-based products like aftershave and makeup , it is a preservative. It also helps fight odor, which is why it's in deodorants and body sprays.

Your toothpaste might have triclosan, too. Colgate Total is the only American Dental Association-approved toothpaste with this ingredient. The FDA approved it after reviewing data showing that it prevents gum disease.

#### Does It Work?

Even though triclosan kills lots of bacteria, scrubbing with it instead of ordinary soap won't make you less likely to catch whatever bug is going around.

In 2013, the FDA asked antibacterial hand and body wash makers to provide data proving that these products were safe and effective, and that they were better at preventing infection than regular soaps and washes.

The Personal Care Products Council and the American Cleaning Institute, which represents manufacturers, has long maintained that triclosan is safe and effective. But the FDA now says that "manufacturers did not provide the necessary data to establish safety and effectiveness" for 19 active ingredients, including triclosan.

"At this time, washing with antibacterial soap has not proven to be more effective than washing with plain soap and water," says Theresa Michele, MD. She directs the FDA's division of nonprescription drug products.

For instance, when researchers analyzed data from 27 studies, they found that people who washed with regular soap were just as likely to get sick as those who used soap with triclosan.

The FDA confirms that there is "extensive evidence" showing that triclosan in Colgate Total toothpaste prevents gum disease . It will remain on the market. But the agency doesn't see an advantage for triclosan in other products.

### What's the Downside?

Because triclosan acts like an antibiotic, its widespread use might be part of the reason that common bacteria are becoming harder to treat, says Rolf Halden, PhD, director of the Biodesign Center for Environmental Security at Arizona State University.

Allison Aiello, PhD, an epidemiology professor at the Gillings School of Global Public Health at the University of North Carolina at Chapel Hill, agrees. She's also concerned that triclosan is getting into the water and is toxic to aquatic animals.

The triclosan in your soap and other personal products isn't likely to be a problem in the short term. But some early research suggests that in the long run, it might affect your hormones, prompt cancer cells (such as breast cancer) to grow, and make it easier for antibiotic-resistant bacteria (like MRSA) to grow in your nose or throat.

Most of those studies have been done only in cells or animals. It's not clear if those risks happen in people.

Some studies of triclosan have looked at possible effects in people. For example, Aiello and her colleagues found that those with the highest concentration of it in their urine were more likely to have allergies. That doesn't prove that triclosan was to blame, though.

#### **Your Options**

If you're concerned about triclosan, you have a simple option until the FDA's rule takes effect. Washing with regular soap and water is your best bet. If you're not near a sink, using a hand sanitizer that contains at least 60% alcohol can nix many germs.