

Japan must have listened to the science on BPA

BY STEVEN HENTGES, PH.D ON JANUARY 9, 2017 IN INDUSTRY, POLICY

More than 10 years ago, bisphenol A (BPA) was a hot topic in Japan. But these days, not so much. The Japanese government ministries with responsibility for human health continue to monitor scientific developments on BPA in the rest of the world, but without any apparent pressure or need for regulatory action. Likewise, there's little or no attention to BPA from Japanese consumers or in the media.

What could account for the difference between Japan and other countries where interest in BPA continues, sometimes with a very high level of intensity? Could it be that the Japanese government and people have listened to the science on BPA?

A clue comes from a recently released report from the Japanese Ministry of the Environment (MOE) titled *The Exposure to chemical compounds in the Japanese People*. For the last 5 years, MOE has been conducting a survey to determine the exposure levels of various chemicals in the Japanese population. The most recent report compiles results for the 5-year period from 2011-2015.

Exposure to BPA was measured by analysis of urine samples, which is considered to be the **most reliable** technique. A primary reason is that BPA is **quickly eliminated from the body** after exposure in the form of a biologically inactive metabolite that is excreted in urine. Essentially the metabolite concentrates in urine, making it easy to detect, and sensitive analytical methods to do so are well established.

The urine biomonitoring results for BPA are remarkable only in how low they are. In fact, the median BPA level over the 5-year period is more than 3,000 times below a "biomonitoring equivalent" (BE) value for BPA that was recently published in the scientific literature. The BE value, which was calculated by Health Canada researchers based on its conservative safe intake limit for BPA, provides a benchmark to quickly assess whether actual intakes are above or below the safe limit. In the case of BPA, actual intakes are far below the benchmark and well within safe limits.

It's not just in Japan where exposure to BPA has been demonstrated to be extremely low. For example, a series of biomonitoring **studies** conducted by the Centers for Disease Control and Prevention have demonstrated low exposures in the U.S. population, and a recent **study** on pregnant women in France showed similar results.

Results from biomonitoring studies are important to help us understand when we should, and should not, be concerned about exposure to a chemical. The results also help to determine when changes in public policy are needed, and when changes are not

needed. For both reasons, listening to the science is critical, and it appears that the Japanese have been listening closely when it comes to BPA.