

Our Response to the Orb Media Report on Micro-plastics in Bottled Water

We Stand by the Quality and Safety of our Bottled Water Products

The safety and quality of our products is our priority. We assure consumers that all of our bottled water products and beverages meet or exceed FDA, EPA, and State Health Department standards and are safe to drink.

We are aware of a recent <u>report</u> about the presence of micro-plastics in bottled water and understand that some consumers have raised questions about the safety of micro-plastics. Recent scientific investigations have highlighted that micro-plastics can be found everywhere, including in the air we breathe, the clothes we wear, the food we eat and the water we drink.

Since 2015, we have tested a range of our products using state-of-the-art laboratory testing devices and techniques, and we have not detected micro-plastic compounds beyond trace levels (below 12 micro-particles per liter). For reference, micro-particles are generally smaller than a grain of sand. With such a minute amount detected in our analyses, it is not possible to determine if these traces are intrinsic to our bottled water operations or merely the result of cross-contamination from the lab environment.

In 2018, we started using a more sophisticated, state-of-the art testing methodology that combines electronic microscope and micro Raman spectroscopy analysis. We used this methodology to test comparable batches of our products to those analyzed by Orb Media. Our test results differ vastly from Orb Media's findings and range from zero to a maximum of 12 micro-particles per liter.

We have responded to Orb Media and shared our results with them in writing. We have also invited them to discuss our respective testing methodologies and to examine our diverging results. We welcome further research on the possible effects of micro-plastics consumption on human health and are ready to collaborate with others to improve understanding of this issue.

In the meantime, we will continue to provide customers and consumers with the safe and high quality bottled water products they have enjoyed for generations.

Frequently Asked Questions on this Topic:

1. What are micro-plastics?

Micro-plastics are small plastic fragments (often smaller than the size of a grain of sand) which are ubiquitous in the environment. These activities include airborne particles from the manufacturing processes of items that we come into contact with each day. Some examples include packaging, clothing, carpet and upholstery fibers

and breakdown of other items in our external environment.

Are there any plastic fibers in your bottled water brands as alleged by Orb Media?

To date, we have not detected micro-plastic compounds beyond trace levels (below 12 micro-particles per liter) in our products through our own testing. The presence of these traces may have a number of possible origins that could affect the test results, including environmental contamination from the air, in the laboratory or from the clothes of analysts handling samples.

What do you mean by "trace level"?

Since 2015, we have tested a range of our products, including Nestlé Pure Life and S. Pellegrino, for the presence of micro-plastics, using state-of-the-art laboratory testing devices and techniques. All tested samples to date range from zero to a maximum of 12 micro-particles per liter. Recent scientific investigations have highlighted that micro-plastics can be found everywhere, including in the air we breathe, the clothes we wear, the food we eat and the water we drink. With such a minute amount detected in our analyses, it is not possible to determine if these traces are intrinsic to our bottled water operations or merely the result of cross-contamination from the lab environment

4. Are there any health concerns associated with the consumption of micro-plastics?

Recent scientific investigations have indicated that micro-plastics are ubiquitous in our environment, and

scientific publications suggest we may ingest hundreds of micro-plastic particles every day through the air we breathe. As is the case for many emerging topics, robust evidence is still lacking on the potential impact of micro-plastics on human health, and whether a safe level of exposure needs to be determined. We welcome further research on this topic.

- 5. How do you know that the packaging you use for your bottled water products is safe? The packaging materials we use in our beverages are safe. The U.S. Food and Drug Administration (FDA) oversees the safety of all food packaging material for all food and beverage companies. At Nestlé Waters North America, we require each of our packaging suppliers to provide us with written documentation that their packaging materials are in full compliance with the FDA requirements. For our bottled water products, we use one of the most common plastic packaging materials, polyethylene terephthalate (PET). The FDA has evaluated the safety of PET and for decades has determined it is safe for use in contact with foods and beverages.
- 6. What kind of state-of-the-art laboratory testing technology are you using?

We currently use a Micro-Raman Analyzer that can identify very small particles (as small as 1 micron) and is reliable in identifying if a particle is plastic. Using this state-of-the-art laboratory testing technology, our tests show a range from zero to a maximum of twelve micro-particles per liter. For reference, micro-particles are generally smaller than a grain of sand. Recent scientific investigations have highlighted that micro-plastics are ubiquitous in our environment. With such a minute amount detected in our analyses, it is not possible to determine if these traces are intrinsic to our bottled water operations or merely the result of cross-contamination from the lab environment.

7. Why are your test results different from those that Orb Media found?

We can't say for sure. According to recognized scientists, the testing approach used by Orb Media could generate false positives. We have invited Orb Media to discuss our respective test methodologies and to examine our diverging results.

8. Tell me more about the methodology used by Orb Media?

From what we have been told, Orb Media's tests used a methodology called fluorescent tagging with Nile Red, which is a longstanding technology for detecting lipids in water – but has only recently been introduced for detecting micro-plastics. Micro-plastic detection requires very strict protocols and precautions, and some of these critical steps are not included in Orb Media's description of their testing methodology. According to recognized scientists, this methodology could generate false positives. We have invited Orb Media to discuss our respective test methodologies and to examine our diverging results.

9. How often do you test your bottled water?

In the United States, all bottled water products are strictly regulated by the FDA and State Health Departments. At Nestlé Waters, we monitor our water brands daily, at both the source and the factory level. In addition, all of our finished products are tested quarterly and annually, for about 900 additional compounds, including microplastics.

10. Do the micro-plastics found in bottled water come from the bottle itself?

There is currently no evidence to suggest this. Recent scientific investigations have highlighted that microplastics are ubiquitous in our environment and may be present regardless of the packaging material used, whether it is plastic, glass or even aluminum. The use of plastic as a packaging material does not generate any risk to the quality of the final bottled water product. In our bottling process, we apply very strict, certified, state-of-the-art quality systems to prevent any source of contamination and to guarantee the quality and safety of our products. We also monitor all of our products for the presence of micro-plastics and, to date, we have not found micro-plastics beyond a trace level (below 12 micro-particles per liter). We assure consumers that our bottled waters are safe to drink.

11. Why is the amount of micro-plastic particles in bottled water allegedly twice as high as the amount found in tap water?

Recent scientific investigations have highlighted that micro-plastics are ubiquitous in our environment. The question of micro-plastic presence therefore goes beyond just tap water or bottled water. That said, the results highlighted by Orb Media regarding bottled water are not consistent with our own internal analysis. To date, we have not found micro-plastic particles beyond a trace level (below 12 micro-particles per liter). We have invited Orb Media to discuss our respective testing methodologies.

12. Some media have reported that the World Health Organization (WHO) plans to investigate the micro-plastics issue. What do you think about that?

We welcome further research on the possible effects of micro-plastics consumption on human health and are ready to collaborate with others to improve understanding of this issue. We welcome the WHO's efforts in this regard.

The Healthy Hydration Company