STATE WATER RESOURCES CONTROL BOARD
RESOLUTION NO. 2020-0021

ADOPTION OF DEFINITION OF 'MICROPLASTICS IN DRINKING WATER'

WHEREAS:

1. Health and Safety Code section 116350 *et seq.*, California Safe Drinking Water Act (Act) requires the State Water Resources Control Board (State Water Board) to administer provisions related to drinking water to protect public health. The Act allows the State Water Board to conduct research, studies, and demonstration programs to ensure provision of a dependable, safe supply of drinking water, which may include improving methods to identify and measure the existence of contaminants in drinking water and to identify the source of the contaminants. The Act also grants the State Water Board the authority to implement regulations that may include monitoring of contaminants, and requirements for notifying the public of the quality of the water delivered to customers;

2. On September 28, 2018, Senate Bill No. 1422 was filed with the Secretary of State, adding section 116376 to the Health and Safety Code, and requiring the State Water Board to adopt a definition of microplastics in drinking water on or before July 1, 2020**;**

3. Section 116376 of the Health and Safety Code requires the State Water Board to, on or before July 1, 2021, (1) adopt a standard methodology to be used in the testing of drinking water for microplastics; (2) adopt requirements for four (4) years of testing and reporting of microplastics in drinking water, including public disclosure of those results; (3) consider issuing a notification level or other guidance to aid consumer interpretation of results; and (4) accredit qualified California laboratories to analyze microplastics;

4. Health and Safety Code section 116376 allows the State Water Board to implement these requirements through adoption of a Policy Handbook that is not subject to the requirements of Chapter 3.5 (commencing with section 11340) of Part 1 of Division 3 of Title 2 of the Government Code;

5. Evidence concerning the toxicity and exposure of humans to microplastics is nascent and rapidly evolving;

6. The State Water Board intends to consider revisions to the definition in response to new information, including but not limited to toxicity and exposure to humans, standards adopted by other nations, regulatory agencies or authoritative bodies, as well as advances in analytical techniques and/or the standardization of analytical methods. Upon adoption of a standardized method as required by Health and Safety Code section 116376, the definition may be revised.

7. Although the State Water Board adopts this definition for drinking water as provided by Health and Safety Code section 116376, it does so with the intent to harmonize this definition with other definitions used in other regulatory areas, and with the understanding that the definition may be considered for regulatory use and other purposes following any necessary regulatory procedures required by law.

8. On March 24, 2020, the State Water Board published a proposed definition of 'microplastics in drinking water' and draft staff report, initiating a 30-day public comment period, which closed April 24, 2020;

9. The State Water Board held a public board workshop on April 7, 2020 to receive oral and written comments from the public on the proposed definition of 'microplastics in drinking water'; and

10. State Water Board staff compiled, reviewed, and prepared draft responses to the comments received;

11. Final responses to all comments that were received during the public comment period are posted on the program webpage at https://www.waterboards.ca.gov/drinking_water/certlic/drinkingwater/microplastics.html

THEREFORE BE IT RESOLVED THAT:

The State Water Board hereby adopts the definition of 'microplastics in drinking water' as appended to this resolution.

CERTIFICATION

The undersigned Clerk to the Board does hereby certify that the foregoing is a full, true, and correct copy of a resolution duly and regularly adopted at a meeting of the State Water Resources Control Board held on June 16, 2020.

AYE:	Chair E. Joaquin Esquivel Vice Chair Dorene D'Adamo Board Member Tam M. Doduc Board Member Sean Maguire Board Member Laurel Firestone
NAY:	None
ABSENT:	None
ABSTAIN:	None

Jeanine Townsend
Clerk to the Board

Definition of 'Microplastics in Drinking Water'*

'Microplastics in Drinking Water' are defined as solid[1] *polymeric materials*[2] *to which chemical additives or other substances may have been added, which are particles*[2] *which have at least three dimensions that are greater than 1 nm and less than 5,000 micrometers (µm)*[3]*. Polymers that are derived in nature that have not been chemically modified (other than by hydrolysis) are excluded.*

*Evidence concerning the toxicity and exposure of humans to microplastics is nascent and rapidly evolving, and the proposed definition of 'Microplastics in Drinking Water' is subject to change in response to new information. The definition may also change in response to advances in analytical techniques and/or the standardization of analytical methods.

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[1]'Solid' means a substance or mixture which does not meet the definitions of liquid or gas.
'Liquid' means a substance or mixture which (i) at 50 degrees Celsius (˚C) has a vapor pressure less than or equal to 300 kPa; (ii) is not completely gaseous at 20 ˚C and at a standard pressure of 101.3 kPa; and (iii) which has a melting point or initial melting point of 20 ˚C or less at a standard pressure of 101.3 kPa.
'Gas' means a substance which (i) at 50 ˚C has a vapor pressure greater than 300 kPa (absolute); or (ii) is completely gaseous at 20 ˚C at a standard pressure of 101.3 kPa.
[2]'Polymeric material' means either (i) a particle of any composition with a continuous polymer surface coating of any thickness, or (ii) a particle of any composition with a polymer content of greater than or equal to 1% by mass.
'Particle' means a minute piece of matter with defined physical boundaries; a defined physical boundary is an interface.
'Polymer' means a substance consisting of molecules characterized by the sequence of one or more types of monomer units. Such molecules must be distributed over a range of molecular weights wherein differences in the molecular weight are primarily attributable to differences in the number of monomer units. A polymer comprises the following: (a) a simple weight majority of molecules containing at least three monomer units which are covalently bound to at least one other monomer unit or other reactant; (b) less than a simple weight majority of molecules of the same molecular weight.
'Monomer unit' means the reacted form of a monomer substance in a polymer.
'Monomer' means a substance which is capable of forming covalent bonds with a sequence of additional like or unlike molecules under the conditions of the relevant polymer-forming reaction used for the particular process.
[3]Size-based nomenclature within the dimensions limits include: "nanoplastics" (1 nm to <100 nm); "sub-micron plastics" (100 nm **to** <1 µm); "small microplastics" (1 µm to < 100 µm); "large microplastics" (100 µm to **<5** mm); "mesoplastics" (**5** mm to <2.5 cm); "macroplastics" (>2.5 cm)