Vermont Department of Environmental Conservation Drinking Water and Groundwater Protection Division

Procedure: Do Not Drink notices necessary to prevent consumption of water for the protection of public health

Section 10.2.3 of the Vermont Water Supply Rule (February 24, 2024) states:

The Secretary may modify the requirements of this subchapter, or require additional public notification measures (e.g. Boil Water notices, Do Not Drink notices, or other language) when necessary, in their judgement, to inform consumers of the water for protection of public health. Such additional measures may include other forms of notification and specific language in the notice.

- A. Circumstances Requiring Additional Public Notice Measures (Do Not Drink notice). Pursuant to Vermont Water Supply Rule (Rule) Section 10.2.3, the Secretary has determined that, in the following circumstances, it is necessary for the protection of public health for a water system to issue a notice to affected consumers¹. The notice must advise consumers not to drink their drinking water or use the water for brushing teeth, making ice cubes, washing fruits and vegetables, and other contaminant-specific details as necessary to prevent consumption of water potentially or actually contaminated resulting in an immediate risk to public health:
 - 1. The water system exceeds the standard listed for any of the following contaminants when sampled at the entry point to distribution²:
 - a. Nitrate 10.0 milligrams per liter (as Nitrogen)
 - b. Nitrite 1.0 milligrams per liter (as Nitrogen)
 - c. **Uranium** 20 micrograms per liter
 - d. Manganese 0.300 milligrams per liter
 - e. **PFAS** 0.000020 milligrams per liter (20 parts per trillion or nanograms per liter) for any combination of: PFOA, PFOS, PFHxS, PFHpA, and PFNA
 - f. Microcystin 0.16 micrograms per liter
 - 2. The water system receives a delivery of bulk water from an unapproved source or does not meet hauling requirements as outlined in Sections 3 and 4 of the Procedure for Bulk Water Hauling as an Emergency Source and in accordance with Section 11.2 of the Rule.
 - 3. The water system receives water from a source of unknown water quality. This may include, but is not limited to, a new unpermitted source, an existing unpermitted source, a previously permitted source that was deepened or hydro-fractured and for which a new permit has not been obtained and for which representative water quality results are not available, as determined by the Secretary.
 - 4. The water system exceeds the respective Action Level identified in the Memorandum of Agreement, #MOU03420-6468, at the entry point to distribution and following consultation with the Vermont Department of Health.
 - a. **benzene** 0.5 micrograms per liter

¹ Affected consumers are all users served by the water system unless expressly identified by the Secretary.

² The entry point to distribution is the sample location following all applicable treatment, storage, and contact time but prior to or at the first connection.

- b. carbon tetrachloride 0.5 micrograms per liter
- c. **dibromochloropropane** 0.02 micrograms per liter
- d. **1,2 dichloroethane** 0.5 micrograms per liter
- e. **1,2 dichloropropane** 0.5 micrograms per liter
- f. **hexachlorobenzene** 0.1 micrograms per liter
- g. **pentachlorophenol** 0.1 micrograms per liter
- h. **tetrachloroethylene** 1 microgram per liter
- i. **trichloroethylene** 0.5 micrograms per liter
- j. **vinyl chloride** 0.5 micrograms per liter
- 5. Any other circumstance in which the Secretary determines that additional measures are necessary for the protection of public health to prevent consumption of water that is potentially or actually contaminated by any of the contaminants listed above, other contaminant of concern, or unknown/unidentified contaminant.
- B. **Notice to Consumers.** As soon as possible, but not more than 24 hours after becoming aware of one of the circumstances identified in Section A, the water system shall provide a Do Not Drink notice that meets the requirements of Section C to every affected consumer.
- C. **Notice; Contents.** The Do Not Drink notice shall use the existing Do Not Drink notice template or other document that includes, at a minimum, all the following information. Section C.1.a through C.1.g shall remain unchanged:
 - 1. Standard language for all Do Not Drink notices:
 - a. As water system users, you have a right to know what you should do, what this means, and what is being done to correct this situation. Due to the potential for impact to human health, the Vermont Department of Environmental Conservation (DEC) has required the water system to provide this Do Not Drink notice to all users of the water system;
 - b. This DO NOT DRINK NOTICE remains in effect until further notice;
 - c. DO NOT DRINK THE WATER. Do NOT use the water for drinking or cooking, brushing teeth, making ice cubes, making baby formula, washing fruits and vegetables, or any other consumptive use;
 - d. Use another source of water for consumption which may include bottled water;
 - e. Water may be used for other uses when you don't swallow the water, such as showering, bathing, or washing clothes or dishes. Try to limit the amount of water children swallow while bathing;
 - f. If you have specific health concerns, contact your health care provider;
 - g. Please share this information with all the other people who drink this water, especially those who may not have received this notice directly (for example, people in apartments, nursing homes, schools, and businesses). You can do this by posting this notice in a public place or distributing copies by hand or mail.
 - h. Explanation by the water system about what it is doing to address the drinking water contamination; and

- i. Contact information for water system personnel managing the situation.
- 2. During times of concern for both bacteriological and chemical contamination through situations such as flooding inundating public system sources or other catastrophic situations resulting in depressurization and an introduction of unknown quality of water as referenced in Section A.3, a Do Not Drink notice shall be implemented and will include a statement for users that washing dishes is prohibited while the water system is under a Do Not Drink.
 - a. A Do Not Drink notice implemented under this condition will not include washing dishes as a prohibited act and standard contaminant specific language shall be applied per Section C.3 when the response is for a routine contaminant that would traditionally trigger Do Not Drink public notification requirements (i.e., PFAS, Uranium, Manganese, Nitrate, and/or Nitrite), or in the situation where the Division has received representative coliform-absent bacteriological results for unpermitted sources.
- 3. If resulting from water quality sampling according to Section A.1 or A.4 above, a Do Not Drink notice must include contaminant specific language and the gray sections in brackets to be filled in by the water system prior to distribution:
 - a. We routinely monitor for the presence of drinking water contaminants. Our water system recently exceeded the drinking water standard for [contaminant name]. The drinking water standard for [contaminant name] is [standard concentration] [reporting units]. A sample collected from [water system name] water system, WSID [WSID number] on [date] had a concentration of [reported concentration] [reporting units];
 - b. DO NOT BOIL THE WATER. Boiling the water is not an adequate form of protection and will not remove [contaminant name] and may concentrate it;
 - c. The following contaminant-specific information (include any/all that apply). If contaminant specific information is not provided below, the water system shall consult with the Secretary on the correct language to be used.
 - Nitrate and/or Nitrite: Infants below the age of six months and older infants born prematurely who drink water containing nitrate in excess of the MCL could become seriously ill and, if untreated, may die. Symptoms include shortness of breath and blue baby syndrome. The safest choice for pregnant persons is to use bottled water or seek an alternate source low in nitrates until further notice.
 - ii) Uranium: Some people who drink water containing combined uranium in excess of the MCL over many years may also have an increased risk of getting cancer and kidney toxicity. Drinking water containing uranium in excess of the MCL for short periods of time may lead to an increased risk of kidney toxicity.
 - iii) Manganese: Manganese is a metal that, in small amounts, is part of a healthy diet. Drinking water may naturally contain manganese and, when concentrations are greater than 0.05 milligrams per liter (mg/L), the water may be discolored and have an unpleasant taste. Over a lifetime, the United States Environmental Protection Agency and the Vermont Department of

Health recommend that people drink water with manganese levels less than 0.300 mg/L to protect the nervous system.

The body only needs a small amount of manganese to function. Infants up to 1 year of age are especially sensitive to excessive amounts of manganese.

Do not use the water for making infant formula or infant food, or for drinking water for infants up to 1 year of age. Instead, use either bottled water or water from an alternate source with a manganese level below 0.300 mg/L. To limit exposure, older children and adults may consider an alternate source of drinking water and cooking water.

Do not boil the water. Boiling, freezing, filtering or letting the water stand does not reduce the manganese levels. Excessive boiling can cause manganese to become more concentrated, because manganese remains behind when the water evaporates. Manganese in water is not a health concern when showering and bathing, washing food, or other non-consumptive household uses of water, including washing clothes, and dishes.

- iv) **PFAS**: PFAS is a group of chemicals that may affect different systems in the body. Although more research is needed, some studies in people have shown that these chemicals may affect growth, learning, and behavior in babies and children; lower a person's chance of getting pregnant; interfere with the body's natural hormones; increase cholesterol levels; affect the immune system; and increase the risk of cancer. These health effects may be the same for pets. Do not use water containing the five PFAS over 20 nanograms per liter (ng/L) to water your garden. The PFAS could be taken up by the vegetables.
- d. An explanation of the condition which resulted in the Do Not Drink notice requirement.
- 4. If the Do Not Drink notice is being required due to a situation identified in Section A.2, A.3, or A.5 above, the notice must include all information directed in section C.1 above and a detailed explanation of the condition which resulted in the Do Not Drink notice requirement.
- D. **Certification.** Pursuant to Section 10.3 of the Rule, within 10 days of issuing the Do Not Drink notice, the water system shall provide a completed Public Notice Certification form to the Secretary along with a copy of the distributed notice.
- E. **On-going Notice.** If the requirement to not drink the water continues for more than three consecutive months, the water system shall:
 - 1. Provide an updated Do Not Drink notice that meets the requirements of Section C to every affected consumer at least every three months; and
 - Within 10 days of issuing the updated Do Not Drink notice, the water system shall provide a completed Public Notice Certification form to the Secretary along with a copy of the distributed notice.
- F. **Satisfaction of Directives.** The water system shall not inform consumers that they can resume consumptive use of the water until the water system receives notification from the Secretary to do so. The Secretary shall notify a water system of the necessary directives to be satisfied so that water

system consumers can resume consumptive use of the water. Upon consultation with the Secretary, one or more of the following steps must have been taken by the water system³:

- a. Perform corrective action approved by the Secretary to reliably and consistently reduce concentrations of contaminant(s) of concern to below the identified drinking water standard;
- b. Submit all required documentation regarding the corrective actions;
- c. Complete other related corrective actions as determined by the Secretary; and/or
- d. Complete water quality monitoring as directed by the Secretary including but not limited to:
 - i) Total Coliform and E. coli Bacteria
 - ii) Inorganic Chemicals
 - iii) Nitrate
 - iv) Volatile Organic Chemicals
 - v) Any additional sample(s) as directed by the Secretary.
- G. Additional Requirements for sampling or other corrective actions. If a water system's water quality monitoring results collected pursuant to Section F show the presence of a contaminant above a level of concern, the water system shall communicate with the Secretary to determine if further corrective action and monitoring is necessary.

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³ Depending on the site-specific condition, the Do Not Drink may be changed to a boil water notice if conditions exist per the boil water policy or if determined by the Secretary as necessary to prevent consumption of water potentially or actually contaminated with waterborne pathogens.