#### COMMON HEALTH QUESTIONS RELATED TO MONOCHLORAMINE

### 20) Is it safe to drink and cook with chloraminated water?

# Chloraminated water that meets EPA regulatory standards is safe to use for drinking and cooking.

- The proposed Stage 1 Disinfectant and Disinfection Byproduct Rule (DBPR) provides the detailed risk assessment process followed in setting the standard for monochloramine.<sup>1</sup>
- Health authorities recognize that some people may have chemical sensitivities and some people may have a chemical sensitivity to monochloramine.<sup>2</sup>
- People who have health concerns about monochloramine use should consult their physicians.

## EPA regulations limit chloramines<sup>3</sup> to levels where no adverse health effects are anticipated.<sup>1</sup>

- The proposed Stage 1 Disinfectant and Disinfection Byproduct Rule (DBPR) provides the detailed risk assessment process followed in setting the standard for monochloramine.<sup>1</sup>
- EPA's risk assessment process included a review of available research and historical data.
- EPA's risk assessment process focused on health outcomes that scientists considered to be most critical.

## Special populations, such as people with weak immune systems, should check with their physicians before consuming any type of drinking water.

- Special populations with potentially weak immune systems include transplant patients and people with AIDS.
- People with weak immune systems can be more susceptible than others to harmful organisms in water.<sup>4</sup>
- People who have weakened immune systems should consult with their physicians regarding any type of drinking water they consume, including bottled water.<sup>5</sup>

#### Additional Supporting Information:

- 1. The final stage 1 DBPR was published in the federal register on December 16 1998 (Volume 63, number 241, pages 69389-69476) it is available on the epa website at: <a href="http://www.epa.gov/ogwdw/mdbp/dbpfr.html">http://www.epa.gov/ogwdw/mdbp/dbpfr.html</a>. The proposed stage 1 DBPR provides the detailed risk assessment and analysis process followed in developing the standard for monochloramine. No changes regarding the MRDL or MRDLG for monochloramine were made from the proposed to the final regulation. The proposed regulation was published on July 29, 1994 (Volume 59, number 145) It is available online at the federal register: <a href="http://frwebgate6.access.gpo.gov/cgi-bin/TEXTgate.cgi?WAISdocID=882277236942+7+1+0&WAISaction=retrieve">http://frwebgate6.access.gpo.gov/cgi-bin/TEXTgate.cgi?WAISdocID=882277236942+7+1+0&WAISaction=retrieve</a>.
- 2. EPA is not aware of any studies regarding monochloramine chemical sensitivity. CDC investigated reports of monochloramine and health effects in Vermont but they were unable to draw any conclusions from the investigation. The CDC Chloramines Vermont Trip Report can be found at
- http://healthvermont.gov/enviro/water/documents/CDC Chloramines report 011608.pdf
- 3. The chloramines limit was set in the Stage 1 DBP Rule. This rule is available at <a href="http://www.epa.gov/safewater/disinfection/index.html">http://www.epa.gov/safewater/disinfection/index.html</a>. In addition, EPA has enforceable regulations to limit occurrence of disinfection byproducts in drinking water for a group of four total trihalomethanes (TTHMs) (chloroform, bromodichloromethane (BDCM), dibromochloromethane (DBCM), and bromoform), a group of five haloacetic acids (HAA5) (monochloroacetic acid (MCA), dichloroacetic acid (DCA), trichloroacetic acid (TCA), monobromoacetic acid (MBA), and dibromoacetic acid (DBA)), and the individual byproducts chlorite and bromate. The maximum contaminant levels for these disinfection byproducts are: TTHMs (0.080 mg/L), HAA5 (0.060 mg/L), chlorite (1.0 mg/L), bromate (0.010 mg/L). See Stage 2 Disinfection Byproducts Rule (71 FR 388, January 4, 2006) for more information on disinfection byproducts and discussion of uncertainties, <a href="http://www.epa.gov/fedrgstr/EPA-WATER/2006/January/Day-04/w03.pdf">http://www.epa.gov/fedrgstr/EPA-WATER/2006/January/Day-04/w03.pdf</a>.
- 4. Potentially harmful organisms include disease-causing bacteria, viruses, and protozoa. Chlorination and chloramination are not effective at inactivating *Cryptosporidium*. EPA requires that utilities that use surface water test and treat for cryptosporidium where necessary.
- 5. More information regarding drinking water for those with weak immune systems is available at: http://www.epa.gov/ogwdw/crypto.html.