



State of Louisiana
Louisiana Department of Health
Office of the Secretary

January 20, 2023

The Honorable Fred H. Mills, Jr., Chairman
Senate Health and Welfare Committee
P.O. Box 94183, Capitol Station
Baton Rouge, LA 70804

The Honorable Larry Bagley, Chairman
House Health and Welfare Committee
P.O. Box 94062, Capitol Station
Baton Rouge, LA 70804

Dear Chairman Mills and Bagley:

Pursuant to ACT 573 of the 2014 Legislative Session, the Louisiana Department of Health (LDH) submits the following annual report as to the state of public water systems across Louisiana regarding drinking water disinfection.

This report was prepared using the monthly compliance data submitted to LDH. State and federal drinking water regulations require public water systems to provide continuous disinfection of drinking water and to measure and report the disinfectant (chlorine) levels on a monthly basis.

In response to three deaths caused by the “brain-eating amoeba,” *Naegleria fowleri* that were associated with the public drinking water in two parishes, the Louisiana Department of Health issued an Emergency Rule on November 6, 2013 requiring public water systems to maintain a higher disinfectant (chlorine) residual level in their distributions systems and increase their number of sampling sites by 25 percent for monitoring of the disinfectant residual in the distribution system each month. Most public water systems in Louisiana were required to meet this new higher disinfection standard by February 1, 2014. The Emergency Disinfection Rule was subsequently re-promulgated and replaced with a final rule (the “Disinfection Rule”) effective March 20, 2016 in accordance with HCR 54 of 2015.

Prior to the Disinfection Rule, Louisiana's regulations, which were implemented in 1995 in accordance with federal guidance, stipulated that drinking water systems were required to maintain only a “trace” or “detectable” level of total chlorine residual at all points in their system at all times. LDH had convened a scientific workgroup of national and international experts to discuss the *Naegleria fowleri* amoeba concerns in Louisiana's public water systems and drinking water disinfection regulation.

The Disinfection Rule is based on scientific data, response protocols from Western Australia, and recommendations from the federal Centers for Disease Control and Prevention (CDC)

relative to the control of the *Naegleria fowleri* amoeba. Under the Disinfection Rule, public water systems must maintain a minimum disinfectant residual level of 0.5 milligrams per liter (mg/l) at all points in their distribution system and finished water storage facilities at all times. This 0.5 mg/l level is known to control the *Naegleria fowleri* amoeba.

There are currently 1,276 public drinking water systems in the state of Louisiana. Public water systems with at least one chlorine residual level below 0.5 mg/l in a one-month period were cited a monthly chlorine residual violation for non-compliance with the Disinfection Rule. Also, public water systems were cited with a monthly monitoring/reporting violation for failing to monitor and/or report the chlorine residual level in their drinking water. Among public water systems for the period of January 1, 2022 through December 31, 2022:

- 744 public water systems (59%) were compliant with the minimum chlorine level for the entire year.
- 524 public water systems (41%) were non-compliant by failing to meet the minimum chlorine level of 0.5 mg/l for at least one month during the year.
 - o 258 public water systems failed to meet the minimum chlorine level for only 1 or 2 months in the year.
 - o 503 public water systems (96%) serve a population of less than 10,000 individuals.
- There were no monitoring/reporting violations for chlorine level in the drinking water for the entire year. Starting in 2017, LDH reinstated sample collection for public water systems, thereby significantly reducing the number of monitoring violations by water systems. LDH is currently collecting samples for approximately 99 percent of the water systems.
- Eight (8) public water systems that have potable water distribution piping comingled with onsite industrial processes retained their disinfection waiver and notify water system users of the risk of microbial contamination in lieu of implementing disinfection.

The attached table provides the number of monthly chlorine residual (CR) violations and the number of monthly chlorine monitoring/reporting (MR) violations for the compliance period of January 1, 2022 through December 31, 2022 for each Louisiana public water system. Should you have any questions regarding the information contained in this correspondence, please do not hesitate to contact me or Caryn Benjamin, Deputy Chief Engineer, Bureau of Engineering Services, at 225-342-7499.

Sincerely,



Amanda Ames, P.E.
LDH/OPH Chief Engineer/Bureau Director

cc: Joseph Kanter, M.D., State Health Officer

Attachment