

## **APPENDIX C**

# **CUSTOMER WATER SERVICE DISINFECTION POLICY SINGLE FAMILY HOME**

## CUSTOMER WATER SERVICE DISINFECTION POLICY

All new or repaired potable water system service pipe and necessary connecting pipe fittings, control valves and all appurtenances in or adjacent to any residence building structure or premise shall be purged of all deleterious material and disinfected prior to utilization or permanent connection or re-connection to the Kent County Water Authority system. That portion of the customer service pipe extending from the curb stop to the building shall be disinfected under the purview of the local plumbing official. The owner must provide written documentation from the plumbing inspector that disinfection was properly conducted in accordance with the American Water Works Association standard C651 and Rhode Island Plumbing Code. A copy of the bacteriological test results indicating compliance with the Rhode Island Department of Health drinking water quality standards for coliform and consistency with Kent County Water Authority water quality for Heterotrophic plate count (HPC) must be obtained before making any permanent connection to the Kent County Water Authority system or reactivation of an existing water service for potable water consumption can be authorized. HPC levels should reflect consistency with that observed in the daily sampling conducted by the Kent County Water Authority and in no case can the HPC results be greater than 25 HPC set by the Executive Director/Chief Engineer. Sample results remain valid for six months from the date taken. If six months have exceeded, then one sample to be taken to verify and confirm water quality is still in compliance. The owner/applicant or customer is responsible for all costs associated with disinfection process or procedures. A plumbing permit from the local municipality is required in conjunction with this work.

### *Disinfection Procedures*

1. The owner, plumber and/or plumbing official shall coordinate activities by contacting the Kent County Water Authority five working days prior to conducting the disinfection process to:
  - Obtain authorization to temporarily connect to the public water system if an alternative supply is not used.
  - Arrange for a representative of the Authority to examine the isolated connection to the public water system.
  - Obtain a reading from the temporary meter (if used).
  - Coordinate activation of the water connection to complete the disinfection and sample retrieval process.
2. The service pipe shall be flushed with clean potable water supplied by the contractor or from an isolated connection to the Kent County Water Authority system until all deleterious material is removed. If the contractor chooses to use the public water system, the contractor shall be responsible for providing a suitable, isolated connection to the Authorities system from the new service pipe.
3. Fill the service piping thereof with a chlorine solution containing at least 50 parts per million chlorine. Once the chlorine concentration in the effluent discharge

reveals the proper concentration, the system shall be valved off and allowed to stand for the required time.

4. Following the required standing time, the service pipe shall be flushed with clean potable water until the chlorine is purged from the service piping. Single family home services shall require one acceptable sample test result. The customer shall elicit the services of a laboratory certified by the Rhode Island Department of Health to analyze the water samples using membrane filter technique or Coli-ert for compliance with Rhode Island Department of Health coliform regulations, and standard heterotrophic plate count test. This requires **two** sample bottles per set of samples, one for the coliform test and one for the heterotrophic plate count. The RI Department of Health has a listing of certified laboratories. The sample retrieval shall be conducted under the purview of the local plumbing official per the requirements contained in the Rhode Island State Plumbing code. Sample results will remain valid until expiration date of the water service application and in any event not to exceed 6 months from the date the samples were analyzed. Sample results remain valid for six months from the date taken. If six months have exceeded, then one sample to be taken to verify and confirm water quality is still in compliance.
5. The disinfection process shall be repeated until the results of the bacteriological testing confirm compliance with the Rhode Island Department of Health drinking water quality standards and heterotrophic plate count consistent with Kent County Water Authority public water system quality set by the Executive Director Chief Engineer.
6. The water service applicant must provide the Authority with copies of the satisfactory laboratory test results and inspection verification letter (per section 107 of plumbing code) from the local plumbing official, before permission will be granted to complete the permanent connection to the public water system.
7. All connection materials shall be kept free of any potential contamination and be swabbed with chlorine solution prior to connection to the newly disinfected service.

**A \$50 SERVICE CHARGE WILL BE APPLIED TO EACH REVISIT TO THE SITE BY A KENT COUNTY WATER AUTHORITY REPRESENTATIVE.**