

# Public Utilities Commission for the Municipality of Chatham-Kent

## Drinking Water Quality Management System

### CK PUC Operational Plan

#### DWQMS Element 7 – Risk Assessment & Element 8 – Risk Assessment Outcomes

##### ***Purpose***

To describe the methods and approaches taken by the Public Utilities Commission for the Municipality of Chatham-Kent (C-K PUC) to identify, assess and where possible, mitigate and/or eliminate potential risks within the drinking-water system

##### ***Scope***

This plan and associated procedures apply to the entire drinking-water systems owned and operated by the C-K PUC. It may also include risks that relate to connecting systems.

The risk assessment process considers, but is not limited to, hazard categories such as:

- a) Biological;
- b) Chemical;
- c) Radiological; and
- d) Physical

##### ***Definition***

Hazard	Any source of danger or a property that may cause drinking-water to be unsafe for human consumption.
Risk (Hazardous Event)	The probability of a hazard to cause harm, including the magnitude of that harm or its consequences.
Control	Any process or contingencies that have been put in place to prevent or reduce the potential for a hazard to occur.

**Critical Control Point** An essential step or point in the subject system at which control can be applied by the operating authority to prevent or eliminate a drinking-water health hazard or to reduce it to an acceptable level.

### ***Policy***

#### **1.0 Identification of Hazardous Events**

- 1.1 A risk assessment team is established to collectively identify, assess, rank and prioritize potential drinking-water related hazards and related risks. This risk assessment process is conducted at least every 3 years.
- 1.2 The related Procedure for Completing the Risk Assessment for Water Treatment Facilities and Distribution Systems – Control No. 2000332 and the Procedure for Review and Update of the Risk Assessment Process – Control No. 2000329 describe in detail the methodologies and approaches taken to conduct these assessments and related activities.
- 1.3 Where appropriate, the team identifies critical control points and where required documents procedures to manage identified risks.
- 1.4 The risk assessment team meets at least once per year to ascertain the currency and validity of the risk assessment and their associated assumptions.

#### **2.0 Risk Assessment Outcomes**

The following will be documented within the Operation Plan

- a) Identified potential hazardous events associated hazards;
- b) Assessed risks associated with the occurrence of hazardous events;
- c) Ranked hazardous events;
- d) Identified control measures to address the potential hazards and hazardous events;
- e) Identifies CCP's and their respective critical control limits; and
- f) Procedures and/or processes to monitor, respond to, report and record deviations in the critical control limits.

### 3.0 Associated Forms, Procedures, Work Instructions

- Completing the Risk Assessment for Water Treatment Facilities and Distribution Systems – Procedure - Control No. 2000332
- Review and Update of the Risk Assessment Process – Procedure - Control No. 2000329
- Monitoring, Responding to, Reporting and Recording a Deviation to a Critical Control Point Procedure - Control No. 2000495

### 4.0 Records