

Information Report

Title: Environmental Services
Compliance Report November 2023

Report Number: Environmental Services-2023-45

Director: Infrastructure &
Development

Manager: Environmental Services

Meeting Date:
Wednesday, December 13, 2023

Executive Summary:

The intent of this report is to inform Council of any compliance related issues and general information from the Environmental Services Department for the month of November 2023.

Context and Background Information:

This report includes a summary of Drinking Water Quality Management Standard Audits, sampling completed in addition to the routine required testing as well as wastewater bypasses and spills reported in the month of November 2023.

Drinking Water Quality Management Standard

An external surveillance audit performed by NSF International took place on October 30-31, 2023. There were no major or minor nonconformities resulting from the audit. There were three Opportunities for Improvement (OFI's) identified during the audit, which do not require a formal response or mandatory implementation but are used as a tool for continual improvement on the Operational Plans, supporting documentation and implementation of the DWQMS. See attached DWQMS Summary of Non-Conformance and OFI from the External Audit for the list of OFI's, internal action plans and the status of implementation.

An Internal process audit on the Water Treatment Process was performed by staff on November 20, 2023. The process audit reviewed the entire treatment process including staff duties and competencies, essential supplies and chemicals required, regulations required to be followed and reporting requirements. There were no non-conformities or opportunities for improvement resulting from the Audit.

Wastewater Bypass and Spill Reporting

A wastewater bypass was reported to the Spills Action Center, the Ministry of Health, Environment Canada and identified downstream users on November 19, 2023 for the Wastewater Effluent Station located at 169 Mahood-Johnston Drive in Kincardine. Currently there is no generator at the effluent station for backup power to the UV disinfection equipment, consequently any flow through the station during a power outage is reported as a wastewater bypass. A planned power outage by Westario Power for the town of Kincardine occurred on Sunday November 19. Staff became aware of the planned outage a few days prior to the event therefore efforts were made to lower the liquid levels at the lagoons on Bruce Avenue, and boards were placed at the outfall to attempt to stop the discharge flow. Most of the liquid was contained in the lagoons but an estimated amount of 47.9m³ of sewage without disinfection went through the effluent station and was sent to Lake Huron. This is compared to an estimated flow of 498m³ that would have been reported if staff had not made attempts to stop the flow in advance of the event. A back up generator for the effluent station was tendered in early 2023 and installation is planned to take place in early 2024.

An overflow/spill of raw sewage was reported to the Spills Action Center and the Ministry of Health on November 23, 2023, for the Kincardine Wastewater Lagoon site located at 520 Bruce Avenue. An operator performing morning rounds at the lagoon site noticed the splitter box between the aerated cell and the lagoon cell was plugged and sewage had overflowed onto the ground. Staff removed the debris from the outlet and the contaminated soil around the splitter box was also removed and disposed of. It was estimated that 0.5m³ of sewage had overflowed onto the ground. The splitter box is typically cleaned in the spring and fall to ensure it is clear of blockages. It was last cleaned out in May 2023, current workload and staffing levels in the department did not allow the time required for this preventative maintenance before the spill occurred.

Wastewater Sampling

Acute Lethality testing is completed annually for the Kincardine Wastewater System and is used to determine if the wastewater discharged from the lagoons is toxic to rainbow trout. Testing was completed on November 14, 2023. The results have not yet been received but are not expected to exceed the limits under the Fisheries Act.

Consultation Overview:

NSF International performed the offsite Surveillance Audit required to retain accreditation for municipal drinking water systems.

Origin:

The Drinking Water Quality Management Standard requires relevant aspects of the Quality Management System to be communicated to the Owner of the system.

Attachments: DWQMS Summary of Non-Conformance_OFI from External Audit Oct 2023

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