

# Site Visit Report

Under the *European Union (Drinking Water) Regulations 2023*, the Environmental Protection Agency (EPA) is the supervisory authority in relation to Uisce Éireann and its role in the provision of public drinking water supplies. This audit was carried out to assess the performance of Uisce Éireann in providing clean and wholesome water to the public water supply named below.

The audit process is a sample of the performance of a water treatment plant and public water supply on a given date.

Water Supply Zone	
<b>Name of Installation</b>	Clashmore
<b>Organisation</b>	Uisce Éireann
<b>Scheme Code</b>	3100PUB1029
<b>County</b>	Waterford
<b>Site Visit Reference No.</b>	SV28258

Report Detail	
<b>Issue Date</b>	02/11/2023
<b>Prepared By</b>	Paul Buckley

Site Visit Detail			
<b>Date Of Inspection</b>	16/10/2023	<b>Announced</b>	Yes
<b>Time In</b>	12:30	<b>Time Out</b>	13:20
<b>EPA Inspector(s)</b>	Paul Buckley Regina Campbell		
<b>Additional Visitors</b>			
<b>Company Personnel</b>	Uisce Éireann: Maura Phelan, Pat Duggan Waterford City and County Council (working in partnership with Uisce Éireann): Dave Whelan, David Hourigan, Denis Conway		

## > Summary of Key Findings

1. The plant was operating satisfactorily on the day of the audit.
2. Persistent low pH was noted following the review of the site logbook. At present there is no action plan to address the low pH issue.

## > Introduction

The Clashmore Public Water Supply (PWS) supplies an average of 100 m<sup>3</sup>/day of water, serving a population of 395. This is not reflective of the volume listed on the EPA EDEN system. The source for the supply is a borehole. Treatment consists of chlorination.

The audit was undertaken to assess Uisce Éireann's performance in producing clean and wholesome water with a focus on the alarms and inhibits in place at the water treatment plant (WTP) and the procedures in place to ensure appropriate oversight of treatment processes.

## > Supply Zones Areas Inspected

The borehole, chlorination disinfection system, and the reservoir at the water treatment plant were inspected.



## 1. Source Protection

	Answer
1.1	Is the abstraction source(s) adequately protected against contamination?
	No
<b>Comment</b>	
<p>Raw water is obtained from 1 no. borehole located adjacent to the Water Treatment Plant (WTP) and is located within the locked and fenced compound.</p> <p>The borehole is protected by a locked above ground concrete structure. The area adjacent to the dip tube in the borehole was not adequately sealed.</p> <p>Landuse in the immediate vicinity comprises of agricultural land. Uisce Éireann and Waterford City and County Council could not confirm when the local landowners were written to in relation to their obligations under the <i>European Union (Good Agricultural Practice for Protection of Waters) Regulations 2022</i>.</p>	



## 2. Management and Control

		Answer
2.1	Has the protozoal compliance log treatment requirement been identified for the water treatment plant?	No
<b>Comment</b>		
The protozoal compliance log treatment requirement for the plant has not been identified. Uisce Éireann confirmed that <i>Cryptosporidium</i> monitoring has not being carried out for the supply in accordance with the Rationale for Determining the Frequency of <i>Cryptosporidium</i> Monitoring in Public Water Supplies.		



### 3. Drinking Water Quality

	Answer
3.1 Have relevant failures to comply with the requirements of the European Union (Drinking Water) Regulations 2023 been notified to the EPA?	No
<b>Comment</b>	
<p>A review of dates in the site logbook showed that low pH levels of &lt; 6.5 (parametric value) were recorded on multiple dates between 03/10/2023 and 16/10/2023. These persistent low pH exceedances were not notified to the EPA at the time of the failures.</p> <p>The pH monitor was displaying 5.97 during the audit.</p>	



## 4. Alarms, Inhibits & Oversight Audits 2023

	Answer
4.1 Has UÉ carried out an alarm and inhibit review at the water treatment plant?	No
<b>Comment</b>	
Uisce Éireann reported that an alarm and inhibit review had not been conducted at the site.	



## 5. Site Specific Issues

		Answer
5.1	Is all pipework suitably maintained to avoid leakage at the treatment plant?	No
<b>Comment</b>		
During the audit a leak was noted originating from the pipework running between the borehole source and the chlorination unit inside of the pumphouse.		

## Recommendations

<b>Subject</b>	Clashmore PWS Audit Recommendations 16/10/2023	<b>Due Date</b>	04/12/2023
<b>Action Text</b>	<p><b>Uisce Éireann is responsible for ensuring a clean and wholesome supply of drinking water and should implement the following recommendations without delay.</b></p> <ol style="list-style-type: none"> <li>1. Carry out works to address the leak noted on the intake pipeline between the borehole and the chlorination system.</li> <li>2. a) Notify historical persistent pH exceedances to the EPA on CRM, b) asses if the supply should be added to Uisce Éireann's National pH file, and c) provide details of remedial actions proposed to restore compliance with the pH parametric value.</li> <li>3. Ensure the borehole is adequately capped. Uisce Éireann should have regard to EPA Advice Note No. 14: Borehole Construction and Wellhead Protection when carrying out these works.</li> <li>4. Undertake an Alarm and Inhibit Review of the plant and submit the findings.</li> <li>5. (a) Confirm the protozoal log treatment requirement for the supply and confirm how the protozoal log deficit will be addressed, and (b) undertake monitoring as per the Uisce Éireann Rationale for Determining the Frequency of <i>Cryptosporidium</i> in Public Water supplies.</li> <li>6. Liaise with Waterford City and County Council to ensure that local landowners have been written to in relation to their obligations under the European Union (Good Agricultural Practice for Protection of Waters) Regulations 2022 as amended.</li> <li>7. Update EDEN with the correct supply volume.</li> </ol> <p><b>Actions required by Uisce Éireann</b></p> <p>During the audit, Uisce Éireann representatives were advised of the audit findings and that action must be taken by Uisce Éireann to address the issues raised.</p> <p>Uisce Éireann should submit a report to the EPA on or before 04/12/2023 detailing the actions taken and planned, with timescales, to close out the above recommendations.</p> <p>The EPA advises that the findings and recommendations from this audit report should, where relevant, be addressed at other public water supplies.</p>		