

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	
Name of Installation	Bree
Organisation	Uisce Éireann
Scheme Code	3300PUB1420
County	Wexford
Site Visit Reference No.	SV32700

Report Detail	
Issue Date	01/08/2025
Prepared By	Sean O'Leary

Site Visit Detail			
Date Of Inspection	01/07/2025	Announced	Yes
Time In	10:30	Time Out	11:30
EPA Inspector(s)	Sean O'Leary		
Additional Visitors			
Company Personnel	Uisce Éireann: Denis McGrath Wexford County Council (working in partnership with Uisce Éireann): Barry Hammel & Krystian Tauroginski		

> Summary of Key Findings

1. The audit found that the turbidity monitor in the Bree Public Water Supply was out of operation for approximately 14 months with no timeframe for repair. A continuous turbidity monitor with alarms and inhibits is required to prevent the entry inadequately treated water into the supply.
2. On the day of the audit the final water pH correction dosing system was out of operation for some time. Uisce Éireann could not explain why the system was not in operation. Trends examined at the audit showed that the pH of the final water was persistently below the pH parametric value of 6.5 on an ongoing basis. The supply is listed on the Uisce Éireann National pH File as a supply with ongoing pH issues.

> Introduction

The Bree Public Water Supply (PWS) supplies an average of 182 m³/day of water, serving a population of 420. The source for the supply is one on-site borehole.

Treatment consists of primary chlorination disinfection. 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).

> Supply Zones Areas Inspected

The on-site borehole, pH treatment system, chlorination dosing system and pumps at the water treatment plant were inspected.



1. Alarms, Inhibits & Oversight Audits 2025

1.1

Is there a documented site specific incident response and incident escalation process?

Answer

No

Comment

1. There is no documented site specific incident response and incident escalation process posted at the WTP.

1.2

Is suitable continuous monitoring in place to verify treatment performance?

Answer

No

Comment

1. The continuous turbidity monitor on the raw water at the WTP is out of operation for approximately 14 months with no plan for repair.

1.3

Is there a documented procedure for responding to specific alarms?

Answer

No

Comment

1. There is no documented procedure for responding to specific alarms.



2. Site Specific Issues

2.1

Are treated water pH results compliant with parametric values?

Answer

No

Comment

1. The Bree Public Water Supply (PWS) is on Uisce Éireann's National pH file due to persistent low pH (< 6.5). Trends examined at the audit showed that the pH of the final water was persistently below the pH parametric value of 6.5

2. Uisce Éireann confirmed that the on-site pH correction has been out of operation for approximately 4 years. Uisce Éireann could not explain why the system was not in operation.

Recommendations

Subject	Audi Recommendations	Due Date	01/09/2025
Action Text	<p>Uisce Éireann is responsible for ensuring a clean and wholesome supply of drinking water and should implement the following recommendations without delay.</p> <ol style="list-style-type: none"> 1. (i) Install a turbidity monitor with appropriate alarm settings and inhibits. (ii) Commence as a minimum daily turbidity checks to ensure turbidity levels remain below the 1 NTU parametric limit. 2. Confirm that the pH correction dosing system has been reinstated. 3. Ensure that: (i) a formal site specific alarm response procedure is in place at the treatment plant and (ii) provide training to relevant staff (including relief and temporary staff) on the requirements of the alarm response procedure. 4. Display a site specific incident response and incident escalation procedure at the water treatment plant with site specific contact details and trigger levels. <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 01/09/2025 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>		