

# 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     | Smithboro     |
| Organisation             | Uisce Éireann |
| Scheme Code              | 2400PUB1010   |
| County                   | Monaghan      |
| Site Visit Reference No. | SV34894       |

| Report Detail |             |
|---------------|-------------|
| Issue Date    | 25/06/2026  |
| Prepared By   | Mary Grimes |

| Site Visit Detail   |                                                                                                                                                       |           |       |
|---------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------|-----------|-------|
| Date Of Inspection  | 25/05/2026                                                                                                                                            | Announced | Yes   |
| Time In             | 12:20                                                                                                                                                 | Time Out  | 13:00 |
| EPA Inspector(s)    | Mary Grimes<br>Veronica Boland                                                                                                                        |           |       |
| Additional Visitors |                                                                                                                                                       |           |       |
| Company Personnel   | Uisce Éireann: Geraldine Friel, Regina Burke<br>Veolia (operating under DBO contract with Uisce Éireann): Robert Mc Cann, Kevin Dunlop, Conor Gormley |           |       |

## > Summary of Key Findings

1. The audit found that the Smithboro Public Water Supply (PWS) was operating satisfactorily on the day of the audit.
2. The groundwater boreholes were not capped to ensure adequate protection, in accordance with *EPA Advice Note No. 14: Borehole Construction and Wellhead Protection*.
3. There were no raw or final water turbidity monitors in place at the plant.
4. The chlorine monitor for contact time verification did not have associated shutdown for low or high chlorine levels.

**Uisce Éireann should submit a report to the EPA on or before the 26/07/2026 detailing the actions taken and planned, with timescales, to close out the 5 recommendations in this audit report.**

## > Introduction

Smithboro PWS serves a population of 577 in Smithboro, Co. Monaghan. The plant design capacity is 180m<sup>3</sup>/day with an average of 156m<sup>3</sup> of treated water being produced at the plant per day. The raw water is sourced from two groundwater boreholes, located on site. Treatment of the water consists of chlorination disinfection.

## > Supply Zones Areas Inspected

The plant treatment processes and the two groundwater boreholes.



## 1. Source Protection

1.1

|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |  | Answer |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|--------|
| Is the abstraction source(s) adequately protected against contamination?                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |  | No     |
| <b>Comment</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |  |        |
| <p>1. The two boreholes supplying the Smithboro PWS are both located on site. The groundwater boreholes are contained within locked, dry chambers, however, the boreholes were not capped in accordance with the requirements of the <i>EPA Drinking Water Advice Note 14: Borehole Construction and Wellhead Protection</i>.</p> <p><b>Recommendation:</b></p> <p>1. Ensure groundwater boreholes are capped to ensure adequate protection, in accordance with <i>EPA Advice Note No. 14: Borehole Construction and Wellhead Protection</i>.</p> |  |        |



2.1

Is there a suitable monitoring frequency for residual chlorine in the network with records available?

Answer

No

**Comment**

1. It was noted that the residual chlorine monitoring in the network monitoring was only being undertaken once per week.

**Recommendation:**

2. Carry out monitoring of residual chlorine several (two to three) times per week at different points of the network to include network extremities.

2.2

Is there a chlorine residual  $\geq 0.1$  mg/l throughout the network?

Answer

Yes

**Comment**

1. While the information provided by Uisce Éireann indicated that the chlorine residual is compliant throughout the network, there were only limited records available onsite on the day of the site visit.

**Recommendation:**

3. Submit a copy of chlorine residual monitoring data for the period 01/05/2026 - 30/05/2026.

2.3

Are suitable plant shutdowns/inhibits in place to prevent the entry of inadequately treated water entering the distribution network?

Answer

No

**Comment**

1. There was no raw or final water turbidity monitor at the WTP.

2. The chlorine monitor for contact time verification did not have associated shutdown for low or high chlorine levels.

**Recommendation:**

4. Install a continuous turbidity monitor with appropriate alarms and inhibits on the final water.

5. Provide a shutdown linked to chlorine on final water and implement final shutdown setpoints ('high' and 'low') to ensure treated water is within the parametric value of the Drinking Water Regulations 2023.

## Recommendations

### **Actions required by Uisce Éireann**

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.

**Uisce Éireann is responsible for ensuring a clean and wholesome supply of drinking water and should implement the recommendations raised in this report without delay.**

### **Response to Audit Report**

Uisce Éireann should submit a report to the EPA on or before the date specified in the Summary of Key Findings detailing the actions taken and planned, with timescales, to close out the recommendations in this audit report.

The EPA advises that the findings and recommendations from this report should, where relevant, be addressed at other public water supplies.

### **Publication of Reports**

Audit reports are published to the EPA's website, [www.epa.ie](http://www.epa.ie), typically 1 month after the audit report is issued to Uisce Éireann.