

Reference RI024201

The Agency requests the following information:

Interpretation of the sharp decrease in sulphate concentrations in groundwater monitoring point OB20 for October 2025.

The decrease in sulphate concentrations recorded at groundwater monitoring point OB20 for October 2025 is not considered anomalous when assessed against the long-term monitoring dataset. Sulphate concentrations at this location have historically exhibited natural fluctuations, with the October result comparable to concentrations previously recorded.

The variability may be attributed to changes in groundwater flow conditions, recharge dynamics, and local geochemical processes within the local hydrogeological setting. The October 2025 result is considered to be within the normal range of historic variation and does not indicate an emerging trend or adverse change in groundwater quality.

Interpretation of the increase in sulphate concentrations in all surface water monitoring locations for October 2025.

The increase in sulphate concentrations recorded in October 2025 was observed across all monitored surface water locations, including the River Boyne and River Blackwater and associated tributaries. The magnitude of the increase is consistent with the range of concentrations previously recorded at these locations.

Historical monitoring data indicate that sulphate concentrations in surface waters display periodic variation in response to seasonal hydrological conditions, catchment-wide processes, and changes in flow and dilution. The October 2025 results are consistent with concentrations previously recorded under comparable conditions.

The widespread and consistent nature of the observed increase across all surface water locations, including upstream and background monitoring points, indicates a broader catchment-scale influence.

Conclusion

In summary, the sulphate concentrations recorded in both groundwater and surface in October 2025 are consistent with historic variability observed at these monitoring locations. The results do not indicate any unusual or site-specific deviation when assessed in the context of the long-term monitoring data. Routine monitoring will continue in accordance with approved monitoring programmes and the conditions and schedules of IE License.