

Our Case Number: ACP-323980-25



An
Coimisiún
Pleanála

Cllr Seán Hartigan
Drominboy House
Lisnagry
Co. Laois
V94 K38R

Date: 04 August 2026

Re: Proposed Water Supply Project for the Eastern and Midlands Region
in the counties of Clare, Limerick, Tipperary, Offaly, Kildare, and Dublin.

Dear Sir / Madam,

An Coimisiún Pleanála has received your submission in relation to the above-mentioned proposed development and will take it into consideration in its determination of the matter.

The Commission will revert to you in due course in respect of this matter.

Please be advised that a copy of all submissions/observations received in relation to the application will be made available for inspection on the Commission's website at the following link:
<https://www.pleanala.ie/en-ie/case/323980>.

If you have any queries in the meantime, please contact the undersigned officer of the Commission. Please quote the above mentioned An Coimisiún Pleanála reference number in any correspondence or telephone contact with the Commission.

Yours faithfully,


Eimear Reilly
Executive Officer
Direct Line: 01-8737184

PA09

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Eimear Reilly

From: LAPS
Sent: Tuesday 21 July 2026 09:05
To: Eimear Reilly
Subject: FW: Proposed Water Supply Project
Attachments: Observations on Response to Submissions SH ACP-323980-25.docx

From: Hartigan, Cllr Sean <sean.hartigan@limerick.ie>
Sent: Friday 17 July 2026 13:17
To: LAPS <laps@pleanala.ie>
Subject: FW: Proposed Water Supply Project

You don't often get email from sean.hartigan@limerick.ie. [Learn why this is important](#)

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Hi.
See attached my observations in relation to Uisce Éireann's response to submissions received by An Coimisiún Pleanála on the Proposed Water Supply Project for the Eastern and Midlands Region.

Regards

Cllr. Seán Hartigan
0857218312

[Limerick City & County Council Disclaimer](#)



Drominboy House.

Lisnagry,

Co. Limerick

Observations in relation to Uisce Éireann's response to submissions received by An Coimisiún Pleanála on the Proposed Water Supply Project for the Eastern and Midlands Region

17 July 2026

Introduction

I welcome the opportunity to respond to Uisce Éireann's submissions response documents for the Water Supply Project. While Uisce Éireann has sought to address a number of concerns raised during the consultation process, significant issues remain unresolved, particularly in relation to projected future water demand, cumulative impacts with the Shannon Fish Passage Project, ecological flow requirements, hydrological modelling assumptions, and compliance with obligations under the Water Framework Directive and Habitats Directive.

My observations focus on areas where the response appears to rely on outdated assumptions, incomplete modelling, or an underestimation of future environmental constraints. In particular, I am concerned that the project continues to be assessed against current operational conditions in the Lower Shannon system, despite an acknowledged need for substantial ecological restoration measures, including increased flows to facilitate fish migration and recovery of protected species. Any assessment of the proposed abstraction must fully account for these future requirements and demonstrate that the project will not compromise the achievement of environmental objectives or the restoration of favourable conservation status within the Lower River Shannon SAC.

6.2.2 Capacity of the Proposed Pipeline

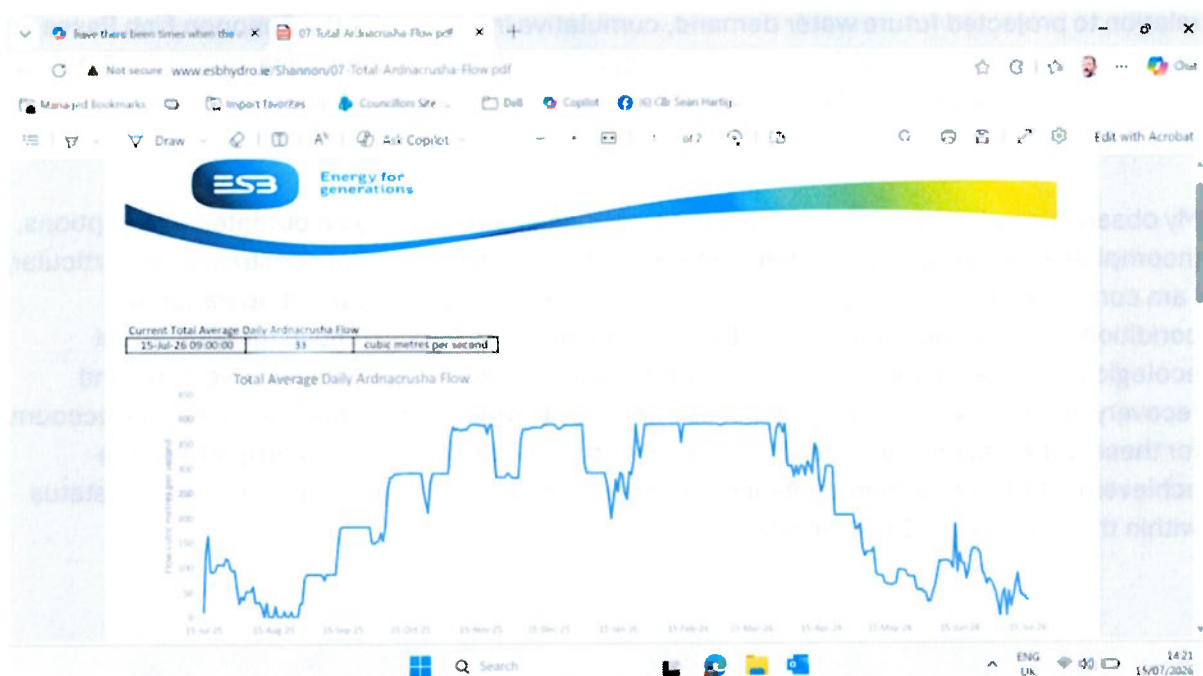
There is nothing to stop UE applying to increase the abstraction licence or the capacity of the water treatment plant in the future. The full capacity of the pipe without the current limiting factors of water treatment and abstraction licencing needs to be divulged. The demand for water beyond 2050 will undoubtedly increase. An Fóram Uisce has expressed concerns in their submission that the demand for water in Dublin to 2050 is not accurately calculated as it is based on 2016 census data and the 2022 census has revealed a significantly greater increase in population. The ESRI1 also highlighted that the 2022 Census data indicated that many previous population scenarios for Ireland have underestimated population growth over the short term, largely due to net migration in recent years. The total pipe capacity and projected increases in population beyond 2050 needs to be factored into modelling/calculations and water demand for the Eastern and Midlands Region needs to be recalculated using both the 2022 Census data and the population projections from the draft National Planning Framework (2024) to properly account for growing water demand.

6.2.5 Adequacy of Designed Storage Capacity

It would be sensible to have increased storage capacity at the end of the pipeline to mitigate against pollution incidents, power outages and demand for water to facilitate fish passage during times of low flow/drought.

10.2.3 Potential Impact of the Proposed Abstraction on Habitats and Species

It is not possible that “water will be diverted to the Proposed Project abstraction from the flow that would otherwise have been used for electricity generation on a continuous year-round basis.” as water is not used for generation on a continuous year-round basis. The ESB's published "Total Average Daily Ardnacrusha Flow" data show multiple recent days with a value of 0 cubic metres per second through Ardnacrusha, including: 3 July 2026: 0 m³/s and 6 July 2026: 0 m³/s. There are many days where generation is not possible and when flows are increased for the fish passage project the number of these days will increase, See below the ESB's own published flow record on 15/07/26. <http://www.esbhydro.ie/Shannon/07-Total-Ardnacrusha-Flow.pdf>



UE admits that Lake level regimes will be affected by the proposed abstraction during extreme drought periods (1995 and 2018) and in the days immediately after the drought, the likelihood is that climate change will increase the frequency of these drought periods and with increased flows needed for fish passage will also impact lake levels. The ESB already cease power generation at Ardnacrusha to prioritise the statutory compensation flow, water will also need to be managed to increase flow to improve fish passage there will be no capacity during drought conditions (when demand is highest) to facilitate abstraction for the water supply project.

UE cannot base their calculations on the current inadequate, ecological damaging flows down the Old River Shannon which are contributing to the extinction of critically endangered species and qualifying interest species of the Lower Shannon SAC. Increased flows down the Old River Shannon need to be factored into modelling and planning applications.

If the water supply project is granted planning either before the implementation of the fish passage project or without considering the eflows needed to facilitate improved fish passage it will present a mortality risk and barrier to some of the qualifying interests of the Lower River Shannon SAC, namely Sea Lamprey (*Petromyzon marinus*), Brook Lamprey (*Lampetra planeri*), River Lamprey (*Lampetra fluviatilis*) and Atlantic Salmon (*Salmo salar*)

11.2.6 Whether Environmental Recovery may be Constrained

The Fish passage project & water supply project Uisce Eireann will impact each other, UE cannot disregard its obligations under the Water Framework Directive, habitats directive, European Communities (Birds and Natural Habitats) Regulations and Conservation Objectives for the Lower River Shannon. It is legally required to demonstrate that water abstraction, altered flow regimes, drought-related effects, cumulative impacts and associated works will not adversely affect the conservation objectives and integrity of the Lower River Shannon SAC. To say that the fish passage project “is not for the Proposed Project to resolve” does not devolve them of their obligations.

If the WSP proceeds without consideration of the FPP it may make it impossible to advance the FPP and make recovery of the Shannon to a good ecological status impossible and lead to further declines/local extinction of critically endangered salmon & eels.

The assessment needs to accept current scientific knowledge that the historic origin of the 10 m³/s flow is determinative for WFD/Habitats Directive compliance. See CDM SMITH pg 128 “The minimum flow provision at Parteen Weir represents European and international best practice for hydropower schemes, in general. However, the comparatively low and uniform compensation flow practice does not present current best practice.”

UE accepts that “The historic pressures salmon and eel populations at Ardnacrusha are long standing and arise from the operation of the hydropower scheme” and that mitigation measures including ecological flow regimes are necessary. UE also accept that the Conservation Objectives for the Lower River Shannon SAC set out a number of measures required to restore favourable condition of the qualifying interests of the SAC, including removal of barriers to fish movement. The current greatest barrier to fish movement is the 10 cumec flow for 11 months of the year on the Old River Shannon. If the WSP is granted permission before these increased flows are in place or factored into modelling/calculations it may rule out the possibility of ever implementing these increased flows.

Regarding UE’s statement that “The single largest pressure acting on adult sea lamprey is that of artificial physical barriers to passage for upstream migrating adult fish..... Barrier removal or modification to permit upstream migration would permit a greater penetration of river channels by adult fish” Increasing flows are modification/mitigation measures to address the impact of barriers. Reduced flows are physical barriers (to fish migration), increasing flows to facilitate flow is removal of a barrier.

I cannot see reference to no freshets during droughts in CDM Smith, UE make the mistake here of assuming that the statutory compensation flow is the natural drought flow, the ‘natural drought flow’ prior to the Shannon scheme would historically have been considerably higher than the current 10m³/s. CDM smith recommend freshets are released during periods when droughts are possible.

See page 119 CDM smith

“ c) Freshet

March - September:

- once per week, 24 hrs duration, max. 21-31 m³/s (M2 scenario for 0.3 m/s, 45 m³/s at confluence)
- 30x 343,000 m³ (March - May) and 1,045,000 m³/s (June - September) per freshet”

In its Hydrological Modelling Report UE has not considered the requirements for freshets during periods of drought, the need for freshets is strongest during low flow conditions. There is international precedent for the release of managed freshets or pulse flows during drought conditions to support salmon migration and survival. During California's 2014–2015 drought emergency, flow augmentation and pulse-flow releases were specifically implemented to aid coho salmon migration and maintain stream connectivity despite severe water scarcity https://www.waterboards.ca.gov/water_issues/programs/swamp/docs/cabw2015/36_collab_flow_flow_salmonids.pdf

UE's Hydrological Modelling Report needs to be redone taking into account the recommendation from CDM smith for March to September

11.2.7 Downstream Effects on the River Shannon

I believe that the reference to “0.5m³/s passing through the Ardnacrusha fish pass” (3 times in this report) displays a lack of knowledge from UE on fish passage on the Shannon scheme, are they confusing Ardnacrusha power station and the Borland fish lock with Parteen weir and its fish pass?

See below pg. 18 CDM Smith

“The fish lock was retrofitted at Ardnacrusha Station and is located about 50 m away from the main (hydropower) flow. This location is not best practice and may result in either delay or failure of the fish to detect the fish lock. The attraction flow is provided by a separate bypass pipe system into the base of the lock shaft and at the lock entrance. However, currently there is no attraction flow during the filling and exit phases at Ardnacrusha because the lower bypass pipe branch valves have been manipulated and permanently closed. During the fishing phase we observed minimal attraction flow (Figure 5) and it is unclear if the upper bypass pipe branch is working correctly. The lack of attraction flow most certainly adversely affects the effectiveness of the fish lock.

Even if the attraction flow system was working properly, the flow volume would be too low relative to best practice. Also, the attraction flow velocity would vary depending on the tailwater level at the entrance and could drop to low velocities. The pattern of the attraction flow changes, and the plume distance reduces with rising tailwater levels, which reduces fish pass attraction. “

24.3.1 Potential Cumulative Impact with the Shannon Fish Passage Study

Considering the critically endangered status of Salmon and eels and the risk they will become locally extinct in the Shannon, as well as obligations to protect other fish species, it is

necessary that the FPP be designed, accepted, and constructed before the Proposed Project may apply for planning.

25.3.2 In-Combination Assessment with the Fish Passage Project

Hymo 7: Water Action Plan 2024 states Implementation of the roadmap of actions, including the use of state-of-the-art technical solutions, to improve fish migration in the lower Shannon at the Hydroelectric scheme located around Parteen and Ardnacrusha. The pilot project will initially examine the feasibility of mitigation and will progress to the next stages, as appropriate. Granting of pp for the WSP may make this impossible.

According to CDM Smith Table 15: Generation model results for EFlow scenario the annual generation loss to the ESB under an eflow scenario is 9,164 MWh. Assuming 15,000 m³ ($E = \rho g H V \eta$) of water is required to produce one MWh, annual diversion of water down the old River Shannon to facilitate fish passage requires $9,164 \times 15,000 \text{ m}^3$ i.e. 137460000 m³. This represents an average cumec flow of 4.36 cumecs. This is more than the 3.47 cumecs required for the water supply project. For June, a month when we have historically had droughts the generation loss is 1,151 MWh, equating to 6.66 cumecs. Uisce Éireann cannot continue to ignore this fact and must incorporate the water requirement for fish passage into its modelling.

Conclusion

In conclusion, Uisce Éireann has not adequately demonstrated that the proposed Water Supply Project can operate in combination with the ecological restoration measures that are required for the Lower River Shannon. The responses provided continue to treat future fish passage and environmental flow requirements as separate matters, despite clear legal, hydrological and ecological links between the two projects.

The evidence available, including findings from the Shannon Fish Passage investigations and CDM Smith reports, indicates that significantly greater volumes of water may be required to restore effective fish passage, support qualifying interest species, and meet Water Framework Directive objectives. These requirements have not been properly incorporated into demand forecasts, drought assessments or hydrological modelling. Furthermore, future population growth beyond 2050, potential increases in abstraction demand, and the project's interaction with climate-driven drought conditions remain insufficiently addressed.

Given the scale of the uncertainties identified, it would be premature to grant consent for the Water Supply Project before the design, water requirements and operational implications of the Shannon Fish Passage Project are fully established and incorporated into all relevant assessments. The precautionary principle, together with Ireland's obligations under European environmental law, requires that these matters be resolved before any decision is made. Failure to do so risks constraining future ecological restoration of the Shannon system, undermining conservation objectives for the Lower River Shannon SAC, and compromising the recovery of already vulnerable and critically important migratory fish populations.

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