Karen Byrne

From: Garvan Hanley <garvan@hanleytaite.com>
Sent: Tuesday 10 March 2026 16:09
To: Appeals2
Cc: Daniel O'Connor
Subject: Re: ACP 323899 - 25
Attachments: An Coimisiún Pleanála -10 03 2026.pdf; RH7 examples.pdf; Dohulla AA Screening V1 Oct.pdf

Dear sir/madam,

Please find attached a response to your letter dated 18th of February last. The response is in letter format with two pages of photos and an AA Screening Report appended.

I would be obliged if you could confirm receipt of this submission.

Thank you and best regards,
Garvan.

Garvan Hanley
Hanley Taite Design Partnership

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Mr Daniel O Connor,
Executive Officer,
An Comisiun Pleanala,
64 Marlborough Street,
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D01 V902.

8th March 2026

Re: Case Number ACP - 323899 - 25
Application under Secion 37L of the Planning and Development Acts 2000 - 2001 for Further Development consisting of (A) restoration of existing unoccupied farm cottage, (B) raising of the wall plate level of existing farm cottage to allow for habitable loft space to comply with current building regulation standards, (C) forming a single storey extension linking existing cottage and adjoining outhouse, (D) restoration, conversion and extension of an existing outhouse to form part of overall single dwelling, (E) form new permeable parking area, (F) decommissioning of existing septic tank and to install a new proprietary sewage treatment system with filter area to comply with current EPA standards, (G) install a new rainwater harvesting system, (H) install surfacewater soakaways as well as associated site works at Emlaghmore, Ballyconneely, Co Galway.

Dear An Coimisuin Pleanala Official,

I hereby write, on behalf of my client, in response to a letter received from your offices dated 18th February last which had attached to it a report from Galway County Council.

There are a number of points made in the Galway County Council report that are commented on hereunder:

1. Assessment of the application under RH7 of the Galway County Development Plan.

Although our application sets out how the proposed development would satisfy policy RH7 we reemphasise the following:

RH7 states that "it *is a policy objective of the Planning Authority that proposals to renovate, restore or modify existing derelict or semi derelict dwellings in the County are generally dealt with on their merits on a case by case basis, having regard to the relevant policy objectives of this plan, the specific location and the condition of the structure and the scale of any works required to upgrade the structure to modern standards. The derelict / semi derelict dwelling must be structurally sound and have the capacity to be renovated or extended and have the majority of its original features in place. A structural report will be required to illustrate that the structure can be brought back into habitable use, without compromising the original character of the dwelling. Where the total demolition of the existing dwelling is proposed an Enurement Clause for seven years duration will apply".* The subject building is clearly a derelict dwelling. The application provides evidence of this through, survey drawings, photographs, a historical report (prepared by Mr. Michael Gibbons, Archaelogist), and a structural report (prepared by Mr. Enda O'Malley, Engineer).

"Lack of evidence of existing services to serve the structures as habitable" is unreasonable in terms of concluding that the existing structures cannot be considered as a dwelling. While the dwelling has not been inhabited for some decades, its last use was that of a dwelling. The historical report clearly demonstrates that it was a dwelling. The plan form and presence of the fireplace are evidence of its use as a dwelling. Notwithstanding that owing to the lapse in time since its last occupancy, has seen no provision of services such as sewage treatment, electricity and water, the cottage was a lived in dwelling that is now derelict. Policy RH7 does not stipulate that there is a requirement for services to exist to these derelict dwellings.

Furthermore In accordance with Policy RH7 our structural report clearly sets out that the derelict dwelling is structurally sound, has the capacity to be renovated or extended and has many of its original features in place. It also sets out that the structure can be brought back into habitable use. The proposal for the development of the cottage sees the existing buildings reused with minimal alteration. Instead "light weight" modern interventions are proposed that leave the original character of the buildings clearly legible.

There are very many precedent cases where permission has been granted by Galway County Council and following appeal by An Bord Pleanala whereby the original derelict dwellings were perhaps less suitable for being made habitable and lacked any services. Some of these cases are highlighted in the Design Statement submitted with the application and for convenience I have appended photos of two of these buildings to this correspondence to allow for a comparison.

2. Intensification of the site for habitable use.

The site has historically been used as a dwelling. The surrounding lands are regularly accessed for agricultural use. The cottage being made habitable again will see a small increase of traffic movement to and from the site. There is a requirement to install a proprietary waste water treatment system and a system for providing potable water. The impact of these systems are considered in the revised NIS, submitted in response to previous submissions on this file.

It is demonstrated in the NIS that the development *"will not give rise to any adverse impacts on the integrity of any Natura 2000 site, either alone or in combination with other plans on projects".* The site is currently served with an electricity supply (subject to a Section 177E application ref no. 323867 - 25)

3. Vehicular access to the property.

The cottage and surrounding associated agricultural lands have been in our clients ownership for in excess of 30 years. The laneway leading to the property, that is outside of our clients ownership, is in the ownership of the state and our client has enjoyed continued unobstructed access to his property for the entirety of his ownership of same. There is no requirement to obtain any right of way or access consents for the use of the laneway.

Concern is raised in the Galway County Council report around the impact of transport of materials to the site during construction. The proposed development is for a modest restoration and extension to an existing derelict cottage. The works have been designed using predominantly materials found on site (stone) and light weight, smaller, dry fixed materials such as sips panels, timber, metal cladding and glass. These materials will be transported using small vehicles. No hgv's will be used as the laneway is unsuitable for same. A revised Construction Environmental Management Plan sets out robust measures to be incorporated during the works and the appointment of an Ecologist Clerk of Works will ensure that no harm occurs to the nearby Natura 2000 sites. Incidentally an Appropriate Assessment Screening Report, prepared for Western Game Anglers relating to proposed works to the stream adjoining the laneway considered the planning application that sought to retain certain works on the subject site (ref no. 2189) and found that no cumulative effects would occur on the Natura 2000 sites. A copy of this report is also appended for reference.

It is uncertain what the statement in the Galway County Council report implies as follows: *" The planning authority highlights that concern and issues regarding vehicular access up the hill to the structures and transport of heavy good / construction materials to the site for construction of previous unauthorized development) have previously failed ...".* There was no failure of any vehicles accessing the site previously and no harm caused to the Natura 2000 sites by vehicular accessing the site at any time in the past.

Conclusion

- We consider, given the evidence provided and significant precedent, that the application should be considered with regard to Policy RH7 of the Galway County Council Development Plan. In light of this it is not necessary to provide local housing need justification.

- It has been demonstrated through the previous submissions on this application (ie the revised NIS, the revised CEMP and the report from Mr. Hugh Fitzpatrick) together with the intention to engage an Ecologist Clerk of Works that significant effects on the Natura 2000 sites will not occur.

- Access to the site by our client is unobstructed and significant measures are proposed to ensure that no harm to the adjoining stream or European designated sites will result from the development.

- We accept the imposition of the conditions as proposed by Galway County Council, should permission be granted, except for Condition 4 - "*Sight distance triangles shall be maintained and kept free from vegetation or other obstructions that would reduce the minimum visibility required*". We do not consider this relevant in this case.

Yours sincerely,

.....

Garvan Hanley,
MRIAI, RIBA,
Accredited in Conservation G2,
Hanley Taite Design Partnership

RH7 POLICY EXAMPLE 1.

DERELICT DWELLING GRANTED PERMISSION AT KEERHALLN SOUTH, BALLYCONNEELY - REF NO: 2260322 ABP 315403-22

RH7 POLICY EXAMPLE 2.

DERELICT DWELLING GRANTED PERMISSION ON TURBOT ISLAND

REF NO: 2460004.

APPROPRIATE ASSESSMENT SCREENING REPORT

Cleaning of Gravels and Spawning Habitat Maintenance at Dohulla Fishery Catchment, Co. Galway

Prepared for: Western Game Anglers

SLR Ref: 501.064732.00001
Version No: 3
September 2023

SLR

Document Control	
Document Properties	
Organisation	SLR Consulting (Ireland) Ltd.
Project Name	Cleaning of Gravels and Spawning Habitat Maintenance at Dohulla River Catchment, Co. Galway
Report Title	Appropriate Assessment Screening Report
Author(s)	Brogan Costello
Draft version/final	Final
Document reference	501.06732.00001

DATE	Revision No	Prepared by	Reviewed by	Approved by	Status	Comments
February 2023	V1	Brogan Costello	Michael Bailey		Draft	
March 2023	V2	Brogan Costello	Michael Bailey		Final Draft	For Client Review
September 2023	V3	Brogan Costello	Michael Bailey	Michael Bailey	Final	For Client Review

BASIS OF REPORT

CONTENTS

FIGURES

1.0 INTRODUCTION

SLR Consulting Ireland (SLR) was commissioned by Inland Fisheries Ireland to prepare an Appropriate Assessment (AA) screening report in support of the planning application at Dohulla River Catchment, Co. Galway.

1.1 Background

This AA Screening report has been prepared in support of the application for obtaining permission to carry out gravel maintenance works for the restoration of spawning beds at Dohulla River Catchment, Co. Galway. This AA Screening report has been prepared in support of the proposed gravel introduction and maintenance works (hereafter, "the Project") at four points within the Owengowla River Catchment. The Western Game Anglers Association is a representative organisation for the private fisheries owners in Connemara and South Mayo. This overall scheme proposes to carry out maintenance within eight specific fisheries for which there will be individual AA Screenings. This will enable fishery owners to take responsibility for managing and implementing measures in their fisheries with the most appropriate support and advice available. This scheme will enable works to be co-ordinated over several small salmonid fisheries (8 in total) where little habitat protection or enhancement has taken place over many years. It will enable maintenance and enhancement of the aquatic habitat to be carried out on each system over a 5–10-year period following the successful screening of intended works. The works visualised are intended to contribute directly to the management of salmonid stocks within Special Conservation Areas (SACs) where Wild Atlantic Salmon are qualifying interests of these SACs, and where the intended works will contribute to, and align with, management plans for Wild Atlantic Salmon.

1.2 General Description of the Site

The Project will take place at two points within the Dohulla River Catchment. The surrounding area is predominately Blanket Peat with few domestic dwellings near the Sites. The Site locations can be seen in Figure 1 and coordinates for each point can be found in Table 3-1.

1.3 Purpose of the Report

The purpose of this report is to provide supporting information to assist the competent authority, in this case Galway County Council, to carry out screening for likely significant effects on Natura 2000 sites as a result of the Project.

1.4 Evidence of Technical Competence and Experience

This report has been prepared by Brogan Costello (SLR Graduate Ecologist) and Michael Bailey (SLR Associate Ecologist) carried out the technical review of this report.

Brogan holds a BSc. in (Botany) from the National University of Galway and an MSc. in Global Change, Ecosystem Science and Policy from the University College Dublin. She has recently joined SLR having previously completed traineeships with the European Commission and Galway County Council. She is a qualifying member of CIEEM.

Michael Bailey holds a BSc. in Biology and Ecology from the University of Ulster and an MSc. in Quantitative Conservation Biology from the University of the Witwatersrand in Johannesburg. He has extensive experience in ecological studies and assessments across a range of sectors in Ireland and of agricultural, mining and renewable energy projects across Africa. He is a full member of the Chartered Institute of Ecology and Environmental Management (MCIEEM)

1.5 Relevant Legislation

1.5.1 European Nature Directives (Habitats and Birds)

The Habitats Directive (Council Directive 92/43/EEC on the Conservation of Natural Habitats and of Wild Fauna and Flora) forms the basis for the designation of Special Areas of Conservation (SAC). Similarly, Special Protection

Areas (SPA) are classified under the Birds Directive (Council Directive 2009/147/EEC on the Conservation of Wild Birds). Collectively, SACs and SPAs are referred to as the Natura 2000 network. The Natura 2000 Network is the minimum required to conserve certain habitats and species which are listed in the Directives.

Under Article 6(3) of the Habitats Directive, an Appropriate Assessment (AA) must be undertaken for any plan or project that is not directly connected with or necessary to the management of a Natura 2000 site but is likely to have a significant effect thereon, either individually or in combination with other plans or projects. An AA is an evaluation of the potential impacts of a plan or project on the conservation objectives of a Natura 2000 site, and the identification, where necessary, of mitigation or avoidance measures to preclude adverse effects on the integrity of the site.

Article 6, paragraph 3 of the European Commission Habitats Directive 92/43/EEC ("the Habitats Directive") states that:

"Any plan or project not directly connected with or necessary to the management of the site but likely to have a significant effect thereon, either individually or in combination with other plans or projects, shall be subject to appropriate assessment of its implications for the site in view of the site's conservation objectives. In the light of the conclusions of the assessment of the implications for the site and subject to the provisions of paragraph 4, the competent national authorities shall agree to the plan or project only after having ascertained that it will not adversely affect the integrity of the site concerned and, if appropriate, after having obtained the opinion of the general public".

1.5.2 European Communities (Birds and Natural Habitats) Regulations 2011

Pursuant to the Habitats Directive, Part 5 of the European Communities (Birds and Natural Habitats) Regulations 2011, as amended, similarly sets out the requirements for screening assessments and the circumstances under which an AA is required.

Regulation 42(1) requires that 'a screening for Appropriate Assessment of a plan or project for which an application for consent is received, or which a public authority wishes to undertake or adopt, and which is not directly connected with or necessary to the management of the site as a European Site, shall be carried out by the public authority to assess, in view of best scientific knowledge and in view of the conservation objectives of the site, if that plan or project, individually or in combination with other plans or projects is likely to have a significant effect on the European site.' Regulation 42(2) expands on this, stipulating that a public authority must carry out a screening for AA before consent for a plan or project is given, or a decision to undertake or adopt a plan or project is taken.

Regulation 42(6) requires that 'the public authority shall determine that an Appropriate Assessment of a plan or project is required where the plan or project is not directly connected with or necessary to the management of the site as a European Site and if it cannot be excluded, on the basis of objective scientific information following screening under this Regulation, that the plan or project, individually or in combination with other plans or projects, will have a significant effect on a European site'.

Regulation 42(3)(a) gives the public authority the power to direct a third party to provide a Natura Impact Statement (NIS) and Regulation 42(3)(b) allows it to request any additional information that it needs to complete the screening assessment or AA. Regulation 42(5) goes on to make clear that the NIS should include such information as the public authority considers necessary to enable it to undertake the AA and to ascertain if a project or plan will affect the integrity of a Natura 2000 site. In addition to the information, Regulation 2(1) provides a definition of a Natura Impact Statement as 'a report comprising the scientific examination of a plan or project and the relevant European Site or European Sites, to identify and characterise any possible implications of the plan or project individually or in combination with other plans or projects in view of the conservation objectives of the site or sites, and any further information including, but not limited to, any plans, maps or drawings, scientific information or data required to enable the carrying out of an Appropriate Assessment'.

Regulation 42(11) makes clear that the AA must be carried out by the public authority and that it must include its conclusion as to whether the project or plan would adversely affect the integrity of a Natura 2000 site, and that this must be done prior to consenting the project.

1.5.3 Planning and Development Act 2000 (as amended)

These processes have been further enshrined in the Planning and Development Act 2000 (as amended), in sections 177T, 177U and 177V, which are as follows:

s177T(1)(b) A Natura impact statement means a statement, for the purposes of Article 6 of the Habitats Directive of the implications of a proposed development, on its own or in combination with other plans or projects, for one or more than one European site, in view of the conservation objectives of the site or sites.

(2) Without prejudice to the generality of subsection (1), a Natura impact report or a Natura impact statement, as the case may be, shall include a report of a scientific examination of evidence and data, carried out by competent persons to identify and classify any implications for one or more than one European site in view of the conservation objectives of the site or sites.

177U. — (1) A screening for appropriate assessment of a draft Land use plan or application for consent for proposed development shall be carried out by the competent authority to assess, in view of best scientific knowledge, if that Land use plan or proposed development, individually or in combination with another plan or project is likely to have a significant effect on the European site.

(4) The competent authority shall determine that an appropriate assessment of a draft Land use plan or a proposed development, as the case may be, is required if it cannot be excluded, on the basis of objective information, that the draft Land use plan or proposed development, individually or in combination with other plans or projects, will have a significant effect on a European site.

177V. — (1) An appropriate assessment carried out under this Part shall include a determination by the competent authority under Article 6.3 of the Habitats Directive as to whether or not a draft Land use plan or proposed development would adversely affect the integrity of a European site and an appropriate assessment shall be carried out by the competent authority, in each case where it has made a determination under section 177U(4) that an appropriate assessment is required, before — ... (b) consent is given for the proposed development.

2.0 METHODOLOGY

2.1 General Approach

The methodology used in this report is based on guidance provided by the National Parks and Wildlife Service (NPWS, 2010), the Office of the Planning Regulator (OPR, 2021) and EC Guidance (EC, 2018) (EC, 2020) (EC, 2021) on the application of Article 6 of the Habitats Directive. The 2021 EC guidance describes a series of stages and steps which should be completed when carrying out the assessment and these are followed here with minor modifications. The assessment applies only to Natura 2000 sites (SPAs and SACs). More specifically, it only applies to the qualifying interest features of such sites i.e., the features which are the reason that the site was designated.

2.2 Stage One: Screening

Stage One is a screening assessment, the purpose of which is to determine whether a plan or project requires more detailed assessment. There are two principal tests. The first considers whether the plan or project is needed for the management of a European site for the purpose of maintaining or restoring its conservation interest. Any such plans or projects can usually be screened out of further assessment. The second test considers whether the plan or project, without specific mitigation measures, would be likely to have a significant effect on any European Site. This requires consideration of the project on its own and in combination with other plans or projects. A project can only be screened out of further assessment if it is certain (beyond reasonable scientific doubt and on the basis of the best scientific knowledge) that there would be no significant effects on any Natura 2000 site without mitigation designed specifically to address potential impacts on the qualifying interest of such sites. Significant effects in this assessment are those which could undermine the conservation objectives of a qualifying interest feature. The process is used to determine which Natura 2000 Sites should be included in the later stages of the assessment. It can also be used to determine which qualifying interest features require further assessment.

2.3 Stage Two: Appropriate Assessment

Stage Two is a more detailed assessment, known as an "Appropriate Assessment" due to the terminology in the legislation. This essentially repeats the second test of the screening assessment but in more detail and considering mitigation measures before reaching a conclusion. At this stage, the test is whether the project or plan will have an adverse effect on the integrity of any European site. This must be done in the light of the conservation objectives for each of the sites and qualifying interest features that have been 'screened in' by the earlier stage of assessment. Any effect which could undermine the conservation objectives is considered an adverse effect on the integrity of the site, and vice versa. If the project is predicted to lead to adverse effects upon the integrity of the site, further stages of assessment are required before the project can be authorised.

2.4 Sources of Information

Sources of information for the assessment of the Project 'alone' include:

- Article 17 and Article 12 reports completed by the National Parks and Wildlife Service[1];
- Site Synopses, Conservation Objectives and Standard Data Forms for the Natura 2000 sites[2];
- Environmental Protection Agency (EPA) Maps[3].

Sources of information for the plans and projects for the 'in combination' assessment were as above and also include:

[1] https://www.npws.ie/publications/article-17-reports?msclkid=0c19d260b00a11ecaf5a935da63f219b (last accessed September 2023)
[2] https://www.npws.ie/protected-sites (last accessed September 2023)
[3] http://gis.epa.ie/ (last accessed September 2023

- Galway County Development Plans 2022 – 2028[4] (effective June 2022); and
- Galway County Council planning portal[5] and myplan.ie[6] were accessed for information on other projects and plans.

[4] Galway County Council (last accessed September 2023
[5] ePlan::Find a planning application (eplanning.ie) (last accessed September 2023
[6] https://myplan.ie/ (last accessed September 2023

3.0 STAGE 1: SCREENING

3.1 Step 1 – Part 1: Management of Natura 2000 Sites

The Site is within Connemara Bog Complex SAC. The purpose of the Project is carry out gravel maintenance works for the restoration of spawning beds at two points (Figure 1). This will contribute the conservation objective of the site which is "To restore the favourable conservation condition of Atlantic Salmon in Connemara Bog Complex SAC". Therefore, the project is considered by the Habitats Directive to be directly connected with or necessary for the management of European designated sites.[7]

The primary purpose of the Project is the conservation management of sites, by introducing gravel to improve salmon and trout pathways and contribute to the overall conservation objectives of the site. Therefore, the Project is considered by the Habitats Directive to be necessary for the management of European designated sites.[8].

3.2 Step 2 – Part 1: Brief Project Description

The Project will take place at two points, the proposed works at each point is detailed in Table 3-1 and shown in Figure 1. IFI has a set of Standard Operating Procedures (SOPs) for the cleaning of gravels and spawning habitat maintenance which will be followed for the Project (Appendix A). All Sites have been assessed for access points and only those which did not require the use of heavy machinery were selected. The points selected within the Site are easily accessible by foot and are suitable for "light-touch" works i.e., little/no disturbance to surrounding habitats and only gravel introduction is being carried out (no removal or vegetation). A list of hand-tools used during the Project can also be found in the SOPs in Appendix A, but it consists of a three-prong fork, petrol hedge trimmer, heavy duty rake, hedge clippers, pruning shears, drag and a slash hook.

As noted in Table 3-1, gravel introduction are the only works being carried out within this Site. Cleaning of gravels can only be done from 1st July through to 30th September each year to allow time for that particular year's fry to mature and also give adequate time to complete the work before trout or salmon return to spawn. The estimated volume of material added to each point will average 1m x 1.5m x 0.3= 5m^3 (0.75t) and the size will vary for trout and salmon habitats. As noted in the SOPs, for Trout, gravel between 5mm and 50mm in diameter should be used, and for Salmon grave between 5mm and 70mm in diameter should be used. Each fishery owner will be responsible for implementing SOPs.

Table 3-1: Proposed works at each point within Dohulla Catchment

Site Locations	Coordinates (ITM)	Proposed works
1	465662 X 742056 Y	Gravel maintenance
2	466375 X 742186 Y	Gravel maintenance

[7] Ecological effects of re-introduction of salmonid spawning gravel in lowland Danish streams - Pedersen - 2009 - River Research and Applications - Wiley Online Library
Spawning season movements of transported landlocked Atlantic salmon in a newly restored river habitat (cdnsciencepub.com)

[8] Ecological effects of re-introduction of salmonid spawning gravel in lowland Danish streams - Pedersen - 2009 - River Research and Applications - Wiley Online Library
Spawning season movements of transported landlocked Atlantic salmon in a newly restored river habitat (cdnsciencepub.com)

3.3 Step 2 – Part 2: Potential Impact Factors

The Project has the potential to result in the following impacts:

- Habitat disturbance – movement or displacement of river substrates which may be utilised by spawning fish
- Raised sediment levels – raised suspended sediment levels in the rivers from disturbance caused by works

The habitats and species listed as features of interest of any Natura 2000 sites within zone of influence of the project must therefore be accessed for affects from habitat disturbance and sediment from Project, and these effects are considered further below.

3.4 Step 3: Identification of Natura 2000 Sites

The first step in identification of relevant Natura 2000 sites for further assessment is to identify those that will be at risk from likely significant effects where a Source-Pathway-Receptor (S-P-R) links exists between the proposed development and the Natura 2000 site. A radius buffer of 15km was utilised, however, Natura 2000 Sites outside of this buffer which have a S-P-R connection were also considered.

The relevant Natura 2000 sites are identified through a review of the nature and scale of the project, the project location relative to Natura 2000 sites, presence of ecological (including mobile and migratory species) and landscape connectivity, such as along waterways, hedgerows and treelines between the Site and the Natura 2000 sites, known impacts and effects likely to arise as a result of this type of project, distance from Natura 2000 sites and the qualifying interests of the Natura 2000 sites (Figure 2).

Table 3-2 below provides a list of Natura 2000 sites which were selected for initial consideration of Source-Pathway-Receptor links which will be assessed as part of the screening process (Figure 2). Table 3-3 provides a description of each site and lists their conservation objects and any Source-Pathway-Receptor links.

Table 3-2: Natura 2000 Sites with potential Source-Pathway-Receptor links

Natura 2000 Site	Site Code	Location at Closest Point to Project Site
Connemara Bog Complex SAC	002034	Site is within the Natura 2000 site
Connemara Bog Complex SPA	004181	Site is within the Natura 2000 site
Murvey Machair SAC	002129	2.1km
Slyne Head Peninsula SAC	002074	3.2km
Slyne Head To Ardmore Point Islands SPA	004159	2.5km
Dog's Bay SAC	001257	4.8km
Cregduff Lough SAC	001251	6.2km

Natura 2000 Site	Site Code	Location at Closest Point to Project Site
The Twelve Bens/Garraun Complex SAC	002031	8.3km
Slyne Head Islands SAC	000328	8.6km
Rosroe Bog SAC	000324	8.8km
West Connacht Coast SAC	002998	8.8km
Kilkieran Bay And Islands SAC	002111	12.2km
Inisbofin, Omey Island and Turbot Island SPA	004231	12.4km

Table 3-3: Designated Sites within the zone of influence of the project

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
Connemara Bog Complex SAC	Coastal lagoons [1150] Reefs [1170] Oligotrophic waters containing very few minerals of sandy plains (*Littorelletalia uniflorae*) [3110] Oligotrophic to mesotrophic standing waters with vegetation of the *Littorelletea uniflorae* and/or *Isoeto-Nanojuncetea* [3130] Natural dystrophic lakes and ponds [3160] Water courses of plain to montane levels with the *Ranunculion fluitantis* and Callitricho-Batrachion vegetation [3260] Northern Atlantic wet heaths with *Erica tetralix* [4010] European dry heaths [4030] Molinia meadows on calcareous, peaty or clayey-silt-laden soils (*Molinion caeruleae*) [6410]	To restore the favourable conservation condition of Northern Atlantic wet heaths with Erica tetralix, European dry heaths, blanket bogs, transition mires and quaking bogs, Depressions on peat substrates of the Rhynchosporion, Alkaline fens and Salmon, in Connemara Bog Complex SAC, And, To maintain the favourable conservation condition of all of Qualifying Interests in Connemara Bog Complex SAC	The Connemara Bog Complex SAC is a large site encompassing the majority of the south Connemara lowlands in Co. Galway. The site is bounded to the north by the Galway–Clifden road and stretches as far east as the Moycullen–Spiddal road. The site supports a wide range of habitats, including extensive tracts of western blanket bog, which form the core interest, as well as areas of heath, fen, woodlands, lakes, rivers and coastal habitats. The site encompasses a large area of relatively undamaged lowland Atlantic blanket bog of high conservation significance both in Ireland and at a European level. The site also contains good examples of at least 13 other habitats listed on Annex I of the E.U. Habitats Directive, as well as four species listed in Annex II. Further, the site supports a number of threatened and protected plant species. The site is internationally important for Cormorant and nationally important for Greenland White-fronted Goose and contains nesting sites for Golden Plover.	**The Site is within this SAC**

[9] For SPAs, the bird species that are the reason for designation are Species of Conservation Interest (SCIs) and for SACs the habitats and species that are the reason for designation are its Qualifying Interests (QIs). For convenience, the term qualifying interest or QI is used here for both SPAs and SACs.

[10] Protected Sites in Ireland | National Parks & Wildlife Service (npws.ie)

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
	Blanket bogs (* if active bog) [7130] Transition mires and quaking bogs [7140] Depressions on peat substrates of the Rhynchosporion [7150] Alkaline fens [7230] Old sessile oak woods with Ilex and Blechnum in the British Isles [91A0] *Euphydryas aurinia* (Marsh Fritillary) [1065] Salmo salar (Salmon) [1106] Lutra lutra (Otter) [1355] *Najas flexilis* (Slender Naiad) [1833]			
Connemara Bog Complex SPA	Cormorant (Phalacrocorax carbo) [A017] Merlin (Falco columbarius) [A098] Golden Plover (Pluvialis apricaria) [A140] Common Gull (Larus canus) [A182]	To maintain or restore the favourable conservation condition of the bird species listed as Special Conservation Interests for this SPA	The Connemara Bog Complex SPA is a large site encompassing much of the south Connemara lowlands of Co. Galway. The site consists of three separate areas - north of Roundstone, south of Recess and north-west of Spiddal. Connemara Bog Complex SPA is of high ornithological importance, in particular for its nationally important breeding populations of Cormorant, Merlin, Golden Plover and Common Gull. It is of note that three of the regularly occurring species, Greenland White-fronted Goose, Merlin and Golden Plover, are listed on Annex I of the E.U. Birds Directive.	**The Site is within this SPA but works within the rivers will have no likely significant effect on SCIs for this SPA. This site will not be considered further as there are no S-P-R links.**

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
Murvey Machair SAC	Machairs (* in Ireland) [21A0] Petalophyllum ralfsii (Petalwort) [1395]	To restore favourable conservation condition of Machairs in Murvey Machair SAC And To maintain favourable conservation condition of Petalophyllum ralfsii in Murvey Machair SAC	Murvey machair SAC is located on the coast approximately 6.5 km west of Roundstone in Co. Galway. The site comprises a 30 m high granite hill, covered in windblown sand supplied from the adjacent beach, and a series of wetlands occurring in the low-lying area to the north of the hill.	**The Site discharges into the same estuary as the SAC, however, there are no rivers or streams connecting to the project Site. This site will not be considered further as there are no S-P-R links.**
Slyne Head Peninsula SAC	Coastal lagoons [1150] Large shallow inlets and bays [1160] Reefs [1170] Annual vegetation of drift lines [1210] Perennial vegetation of stony banks [1220] Atlantic salt meadows (Glauco-Puccinellietalia maritimae) [1330] Mediterranean salt meadows (Juncetalia maritimi) [1410] Embryonic shifting dunes [2110] Shifting dunes along the shoreline with Ammophila arenaria (white dunes) [2120]	To restore the favourable conservation condition of Coastal lagoons, Atlantic salt meadows (*Glauco-Puccinellietalia maritimae*), Mediterranean salt meadows (*Juncetalia maritime*), Embryonic shifting dunes, Embryonic shifting dunes and Machairs at Slyne Head Peninsula SAC And To maintain the favourable conservation condition of all other QI's at Slyne Head Peninsula SAC	"This site comprises the peninsula west of Ballyconneely, Co. Galway. It extends northwards to Errislannan Point to include the shallow waters of Mannin Bay. This site is of ecological importance for the range and diversity of its semi-natural habitats, many of which are listed on Annex I of the Habitats Directive. The interface between calcareous sand dunes, machair, heath and grassland communities is of Version date: 09.01.2019 5 of 5 002074_rev19.docx particular note. The site is also important for a number of rare and scarce species, especially the liverwort Petalophyllum ralfsii. The site is also of marine conservation importance due to the occurrence of groups of Bottlenose Dolphin, a species listed on Annex II of the Directive."	**The Site discharges into the same estuary as the SAC, however, the SAC is upstream of the project Site. This site will not be considered further as there are no S-P-R links.**

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
	Machairs (* in Ireland) [21A0] Oligotrophic waters containing very few minerals of sandy plains (Littorelletalia uniflorae) [3110] Oligotrophic to mesotrophic standing waters with vegetation of the Littorelletea uniflorae and/or Isoeto-Nanojuncetea [3130] Hard oligo-mesotrophic waters with benthic vegetation of Chara spp. [3140] European dry heaths [4030] Juniperus communis formations on heaths or calcareous grasslands [5130] Semi-natural dry grasslands and scrubland facies on calcareous substrates (Festuco-Brometalia) (* important orchid sites) [6210] Molinia meadows on calcareous, peaty or clayey-silt-laden soils (Molinion caeruleae) [6410] Lowland hay meadows (Alopecurus pratensis, Sanguisorba officinalis) [6510] Alkaline fens [7230]			

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
	Tursiops truncatus (Common Bottlenose Dolphin) [1349] Petalophyllum ralfsii (Petalwort) [1395] Najas flexilis (Slender Naiad) [1833]			
Dog's Bay SAC	Annual vegetation of drift lines [1210] Embryonic shifting dunes [2110] Shifting dunes along the shoreline with Ammophila arenaria (white dunes) [2120] Fixed coastal dunes with herbaceous vegetation (grey dunes) [2130] European dry heaths [4030]	To maintain the favourable conservation condition of Embryonic shifting dunes and European dry heaths in Dog's Bay SAC And To restore favourable conservation condition of all other QI's in Dog's Bay SAC	"Dog's Bay is located 3.5 km south-west of Roundstone village in Co. Galway. The site includes a granite 'island' which is linked to the mainland by a sandy spit, a feature which is known as a tombolo. Dog's Bay curves along the west side of this tombolo, with Gorteen Bay to the east. Dog's Bay is an important site as it provides a fine example of a tombolo. The Foraminfera sand is also of great interest, this being one of the few beaches worldwide where Foraminifera sand is found onshore. The coastal habitats are of conservation importance, notably the fixed dune vegetation which is a priority habitat on Annex I of the E.U. Habitats Directive"	**This SAC is in a different sub catchment to the Site with no connecting rivers or streams. This site will not be considered further as there are no S-P-R links.**
Cregduff Lough SAC	Transition mires and quaking bogs [7140] Najas flexilis (Slender Naiad) [1833]	To maintain the favourable conservation condition of the Qis at Cregduff Lake SAC	"Cregduff Lough is a small coastal lake located 1 km south-west of Roundstone village in Co. Galway. The lake occupies a hollow in rocky, heath-covered, undulating terrain. The bottom of the lake is unconsolidated muddy material and about 60% of the water surface is covered by a scraw of reedswamp vegetation (i.e. it is floating). Encroachment by vegetation has	**The Site discharge into this estuary but there are no connecting rivers and streams. This site will not be considered further as there are no S-P-R links.**

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
			progressed to such a level that there are virtually no areas of open water remaining in the northern half of the lake. Cregduff Lough is an excellent example of an infilling lake, and one that supports a good diversity of vegetation types ranging from open water communities, to quaking transition mire, to species-rich freshwater marsh vegetation. The site is of major conservation significance because of the presence of habitats and species listed in the E.U. Habitats Directive. The populations of Slender Naiad and Slender Cottongrass add considerably to the value of the site. Additionally, the surrounding area of coastal heath is a fine example of this habitat type."	
The Twelve Bens/Garraun Complex SAC	Oligotrophic waters containing very few minerals of sandy plains (Littorelletalia uniflorae) [3110] Oligotrophic to mesotrophic standing waters with vegetation of the Littorelletea uniflorae and/or Isoeto-Nanojuncetea [3130] Alpine and Boreal heaths [4060] Blanket bogs (* if active bog) [7130] Depressions on peat substrates of the Rhynchosporion [7150] Siliceous scree of the montane to snow levels (Androsacetalia	To restore the favourable conservation condition of Alpine and Boreal heaths, Blanket bogs, Depressions on peat substrates of the Rhynchosporion, Siliceous scree of the montane to snow levels, Calcareous rocky slopes with chasmophytic vegetation, Siliceous rocky slopes with chasmophytic vegetation and Freshwater Pearl Mussel in The Twelve Bens/Garraun Complex SAC And, To maintain the favourable conservation condition of	"This is an extensive site situated in the north-west of Connemara in Co. Galway and dominated by mountainous terrain. The site is bounded to the south by the Connemara Bog Complex, to the east by the Maumturk Mountains and to the north by Killary Harbour. The Twelve Bens/Garraun Complex includes a wide variety of habitat types, nine of which are listed on Annex I of the E.U. Habitats Directive (including one with priority status), and populations of many rare or scarce plant and animal species. It is one of the largest and most varied protected sites in Ireland and so is of high conservation interest."	**This SAC is in a different sub catchment to the Site with no connecting rivers or streams. This site will not be considered further as there are no S-P-R links.**

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
	alpinae and Galeopsietalia ladani) [8110] Calcareous rocky slopes with chasmophytic vegetation [8210] Siliceous rocky slopes with chasmophytic vegetation [8220] Old sessile oak woods with Ilex and Blechnum in the British Isles [91A0] Margaritifera margaritifera (Freshwater Pearl Mussel) [1029] Salmo salar (Salmon) [1106] Lutra lutra (Otter) [1355] Najas flexilis (Slender Naiad) [1833]	all other Qualifying Interests in The Twelve Bens/Garraun Complex SAC		
Slyne Head Islands SAC	Reefs [1170] Tursiops truncatus (Common Bottlenose Dolphin) [1349] Halichoerus grypus (Grey Seal) [1364]	To maintain the favourable conservation condition of all QI's at Slyne Head Islands SAC	"This site comprises a long archipelago of islands, islets, rocks and reefs located off the western shores and south-western tip of the Slyne Head Peninsula in Co. Galway. This site is an important example of exposed low-lying western islands with good examples of reefs, a significant grey seal population and important colonies of breeding birds. The site is also of conservation importance due to the occurrence of groups of Bottlenose Dolphin, a species listed on Annex II of the E.U. Habitats Directive."	**This SAC is in a different sub catchment to the Site with no connecting rivers or streams. This site will not be considered further as there are no S-P-R links.**

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
Rosroe Bog SAC	Blanket bogs (* if active bog) [7130] Depressions on peat substrates of the Rhynchosporion [7150]	To restore the favourable conservation condition of the Qis at Rosroe Bog SAC	"Rosroe Bog is situated in the north-western corner of the largest peninsula in Bertraghboy Bay, Connemara, Co. Galway. The site overlies a bedrock of granite. It is bounded on both the northern and western sides by the waters of the bay and on the southern and eastern sides by granitic ridges rising to about 50 m above sea level. The site is characterised by gently undulating areas of blanket bog interrupted by scattered rocky ridges, often with heath, and contains two small lakes, Rosroe Lough and White Lough. Rosroe Bog is of considerable conservation significance, particularly for the example of lowland western blanket bog that it supports. Blanket bog is listed with priority status on Annex I of the E.U. Habitats Directive. A further habitat listed on Annex I of the Directive, and which is well-represented at the site, is Rhynchosporion vegetation. The presence of areas of dry heath with species characteristic of the region adds further to the significance of the site."	**This SAC is in a different sub catchment to the Site with no connecting rivers or streams. This site will not be considered further as there are no S-P-R links.**
West Connacht Coast SAC	Tursiops truncatus (Common Bottlenose Dolphin) [1349]	To maintain the favourable conservation condition of Common Bottlenose Dolphin in West Connacht Coast SAC	"This site consists of a substantial area of marine waters lying off the coasts of Counties Mayo and Galway in the west of Ireland."	**The Site does not discharge into this estuary and there are no connecting rivers and streams. This site will not be considered further as there are no S-P-R links.**
Kilkieran Bay and Islands SAC	Mudflats and sandflats not covered by seawater at low tide [1140] Coastal lagoons [1150]	To restore the favourable conservation condition of Atlantic salt meadows, Mediterranean salt	Kilkieran Bay and Islands SAC is located just north of Galway Bay and extends from Keeraun Point, south of Carraroe, westwards to Mace Head, west of Carna, all	**This SAC is in a different sub catchment to the Site with no connecting rivers or streams. This site will not be considered**

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
	Large shallow inlets and bays [1160] Reefs [1170] Atlantic salt meadows (Glauco-Puccinellietalia maritimae) [1330] Mediterranean salt meadows (Juncetalia maritimi) [1410] Machairs (* in Ireland) [21A0] Oligotrophic to mesotrophic standing waters with vegetation of the Littorelletea uniflorae and/or Isoeto-Nanojuncetea [3130] Lowland hay meadows (Alopecurus pratensis, Sanguisorba officinalis) [6510] Lutra lutra (Otter) [1355] Phoca vitulina (Harbour Seal) [1365] Najas flexilis (Slender Naiad) [1833]	meadows, Machairs and *Lutra lutra* at Kilkieran Bay and Islands SAC And, To maintain the favourable conservation condition of all other QIs of Kilkieran Bay and Islands SAC	in Co. Galway. The site contains a large area of open marine water, many islands and rocky islets, and the coastline is much indented with a series of bays (notably the interconnected Kilkieran Bay and Greatman's Bay), channels and inlets.	**further as there are no S-P-R links.**
Inisbofin, Omey Islands and Turbot Islands SPA	Corncrake (Crex crex) [A122]	To maintain or restore the favourable conservation condition of the bird species listed as Special Conservation Interests for this SPA	"Inishbofin, Omey Island and Turbot Island SPA comprises parts of three islands lying off the coast of Connemara in Co. Galway. Inishbofin, the largest of the three islands, is situated c. 5 km from the mainland and some 20 km north-west of Clifden. Inishbofin, Omey Island and Turbot Island SPA is of high ornithological importance as it supports a nationally important population of Corncrake, a globally	**The Site is unlikely to support breeding or feeding habitats for the SCI of this SPA. This site will not be considered further as there are no S-P-R links.**

Natura 2000 Site	Qualifying Interests[9]	Conservation Objective	Brief Description[10]	Connections (Source-Pathway-Receptor)
			threatened species. Corncrake is also listed on Annex I of the E.U. Birds Directive."	

3.5 Step 4 - Part 1: Assessment of Likely Significant Effects for Project Alone

The potential sources of impact identified as a result of the Project include habitat disturbance and sediment generation. As the Project will be utilising "light-touch" works methods, i.e., no machinery will be used, and only existing access routes will be utilised to carry out the works therefore there will be minimal disturbance to the riverbed disturbance and sediments generated will be negligible.

Gravel maintenance and reintroduction has been shown to improve salmon and trout reproduction and population sizes (Hatanpaa, A. *et al.*, 2020; Pulg et al., 2021) and are beneficial as salmon parr are reliant on gravel availability (Pulg et al., 2019). As the Site is within the Connemara Bog Complex SAC, of which *Salmo salar* is a QI and that has a "restore" CO, the Project will contribute to this CO by supporting *Salmo salar* populations. It will also contribute to other QI's such as *Lutra lutra* which has a CO of "maintain" as it will provide food sources.

As there will be no likely significant effects on water quality due to minimal sediment disturbance from the Project, the QIs of Connemara Bog Complex SAC will not be impacted. Several of the QIs of Connemara Bog Complex SAC are located to the north of the SAC[11], whereas the Site is to the west of the SAC (Figure 2). Point 1 is located near habitats of the QI of [3110] Oligotrophic waters containing very few minerals of sandy plains (*Littorelletalia uniflorarae*) and Point 2 [3130] Oligotrophic to mesotrophic standing waters with vegetation of the *Littorelletea uniflorarae* and/or *Isoeto-Nanojuncetea*, however, as water quality will not be affected by the Project, neither will the conservation objectives of the QI. Slender Naiad (*Najas flexilis)* is a characteristic of this QI, however, it is not present within Loch Béal na Comhlann (NPWS, 2015).

The same rationale applies for Northern Atlantic wet heaths with *Erica tetralix* [4010], European dry heaths [4030], Molinia meadows on calcareous, peaty or clayey-silt-laden soils (*Molinion caeruleae*) [6410], Blanket bogs (* if active bog) [7130], Transition mires and quaking bogs [7140], depressions on peat substrates of the Rhynchosporion [7150], and Alkaline fens [7230]. Since they have not been mapped by NPWS so it is unclear what locations they are present in within the SAC. However, as there will be no impacts on water quality as a result of the Project and no habitat/vegetation removal, there will be no likely significant effects on these QIs.

The increased salmon populations can contribute to the "restore" CO for Cormorant bird species that are listed as SCI's of Connemara Bog Complex SPA as it will provide a food source for them. As there will no vegetation removal or disturbance, there will no likely significant effect on habitat utilised by the SCI's of Connemara Bog Complex SPA.

As the Project is contributing to the conservation objectives (CO) of one of the QI's of the Connemara Bog Complex SAC it can be said that that this is necessary for the management of this Natura 2000 site, and the Project will not result in any negative likely significant effects or effect other QIs/SCIs of surrounding Natura 2000 Sites.[12]

Therefore, there will be no likely significant effects as a result of the Project, and it will contribute positively to the conservation objectives of Connemara Bog Complex SAC and SPA.

3.6 Step 4 - Part 2: Assessment of Likely "In Combination" Effects

Cumulative effects can result from individually insignificant but collectively significant actions taking place over a period or concentrated in a location. Cumulative effects can occur where a proposed development

[11] ConservationObjectives.rdl (npws.ie)
[12] EN.pdf (europa.eu)

results in individually insignificant impacts that, when considered in-combination with impacts of other proposed or permitted plans and projects, can result in significant effects (CIEEM, 2018).

Planning applications on Galway County Council Planning portal were assessed for possible cumulative effects with the Project (Table 3-4).The few plans and projects granted near the Site were restricted to small scale residential developments and amendments and all were downstream of the Site. Therefore, it is considered that cumulative effects on nearby Natura 2000 Sites and will not occur as a result of the Project.

Table 3-4: Planning applications considered for in combination effects.

Planning Reference	Planning Description	Address
2189	To (1) Remove existing roof structure added to semi-ruinous cottage in circa 1990's (2) Retain works associated with alterations to existing window opes (3) Retain and complete works to reinstate and make good existing stone chimney (4) Retain security cameras fixed to existing building façade for a temporary period until the cottage is developed and prior to its occupation or a period of 2 years if undeveloped (5) Restore existing semi-ruinous farm cottage to make habitable; including formation.	Emlaghmore, Co. Galway
2360507	Of refurbishment and upgrading works [including (where necessary) replacement of existing poles along the existing overhead electricity line, minor ground works e.g. replacement or installation of stays, and maintenance or improvement works]; and all associated ancillary works including the provision of temporary accessways. Replacement poles will be constructed at, or immediately adjacent to, the existing structures that they will replace. Replacement poles will have a maximum height of 12m.	Doonloughan – Foorglass, Co. Galway
2260598	(1) retention of existing dwelling house, (2) retention of existing garage, (3) removal of enurement clause. Gross floor area to be retained: 180.76 sqm (dwelling house) and 24.12 sqm (garage).	Callow Roundstone, H91 X6E8, Co. Galway

3.7 Step 5: Consideration of Findings

This screening report, based on the available information and project details, demonstrates that the proposed development does not pose a risk of likely significant effects on Natura 2000 sites, it will contribute to the conservation objectives of the Natura 2000 sites.

We therefore submit that the competent authority, in this case Inland Fisheries Ireland, can determine that appropriate assessment is not required, as the proposed Project, individually or in combination with other plans or projects, will not have a significant effect on any Natura 2000 sites and will contribute to the conservation objectives necessary for management of relevant Natura 2000 sites.

4.0 REFERENCES

CIEEM (2018) *Guidelines for Ecological Impact Assessment in the UK and Ireland: Terrestrial, Freshwater, Coastal and Marine.* Chartered Institute of Ecology and Environmental Management, Winchester.

DoEHLG (2009). Appropriate Assessment of Plans and Projects in Ireland: Guidance for Planning Authorities. National Parks and Wildlife Service, Department of the Environment, Heritage and Local Government. Dublin.

European Commission (2001). Assessment of Plans and Projects significantly affecting Natura 2000 Sites: Methodological guidance on the provisions of Article 6(3) and (4) of the Habitats Directive 92/43/EEC.

European Commission (2018). Managing Natura 2000 Sites: The Provisions of Article 6 of the 'Habitats Directive' 92/43/EEC.

European Union Habitats Directive, (1992). Council Directives 92/43/EEC of 21 May 1992 on the conservation of natural habitats and of wild fauna and flora.

European Union Birds Directive (2009) Directive 2009/147/EC of the European Parliament and of the Council of 30 November 2009 on the conservation of wild birds (codified version).

Hatanpaa, A. et al. (2020) Spawning season movements of transported landlocked Atlantic Salmon in a newly restored river habitat, Canadian Science Publishing. Available at: https://cdnsciencepub.com/doi/full/10.1139/cjfas-2019-0334 (Accessed: February 1, 2023).

NPWS (2016) Conservation Objectives: Connemara Bog Complex SAC 002034. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2022) Conservation objectives for Connemara Bog Complex SPA [004181]. First Order Site-specific Conservation Objectives Version 1.0. Department of Housing, Local Government and Heritage.

NPWS (2021) Conservation Objectives: Cregduff Lough SAC 001251. Version 1. National Parks and Wildlife Service, Department of Housing, Local Government and Heritage.

NPWS (2017) Conservation Objectives: Dog's Bay SAC 001257. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs.

NPWS (2017) Conservation Objectives: Murvey Machair SAC 002129. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs.

NPWS (2019) Conservation Objectives: Slyne Head Peninsula SAC 002074. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2012) Conservation Objectives: Slyne Head Islands SAC 000328. Version 1.0. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2017) Conservation Objectives: The Twelve Bens/Garraun Complex SAC 002031. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs.

NPWS (2017) Conservation Objectives: Rosroe Bog SAC 000324. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs.

NPWS (2015) Conservation Objectives: West Connacht Coast SAC 002998. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2014) Conservation Objectives: Kilkieran Bay and Islands SAC 002111. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2022) Conservation objectives for Inishbofin, Omey Island and Turbot Island SPA [004231]. First Order Site-specific Conservation Objectives Version 1.0. Department of Housing, Local Government and Heritage.

NPWS (2015) Site Synopsis: Connemara Bog Complex SAC 002034. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2010) Site Synopsis for Connemara Bog Complex SPA [004181]. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2013) Site Synopsis: Cregduff Lough SAC 001251. Version 1. National Parks and Wildlife Service, Department of Housing, Local Government and Heritage

NPWS (2013) Site Synopsis: Dog's Bay SAC 001257. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs.

NPWS (2013) Site Synopsis: Murvey Machair SAC 002129. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs.

NPWS (2019) Site Synopsis: Slyne Head Peninsula SAC 002074. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2019) Site Synopsis: Slyne Head Islands SAC 000328. Version 1.0. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

NPWS (2015) Site Synopsis: The Twelve Bens/Garraun Complex SAC 002031. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs.

NPWS (2013) Site Synopsis: Rosroe Bog SAC 000324. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs.

NPWS (2015) Site Synopsis: Kilkieran Bay and Islands SAC 002111. Version 1. National Parks and Wildlife Service, Department of Arts, Heritage and the Gaeltacht.

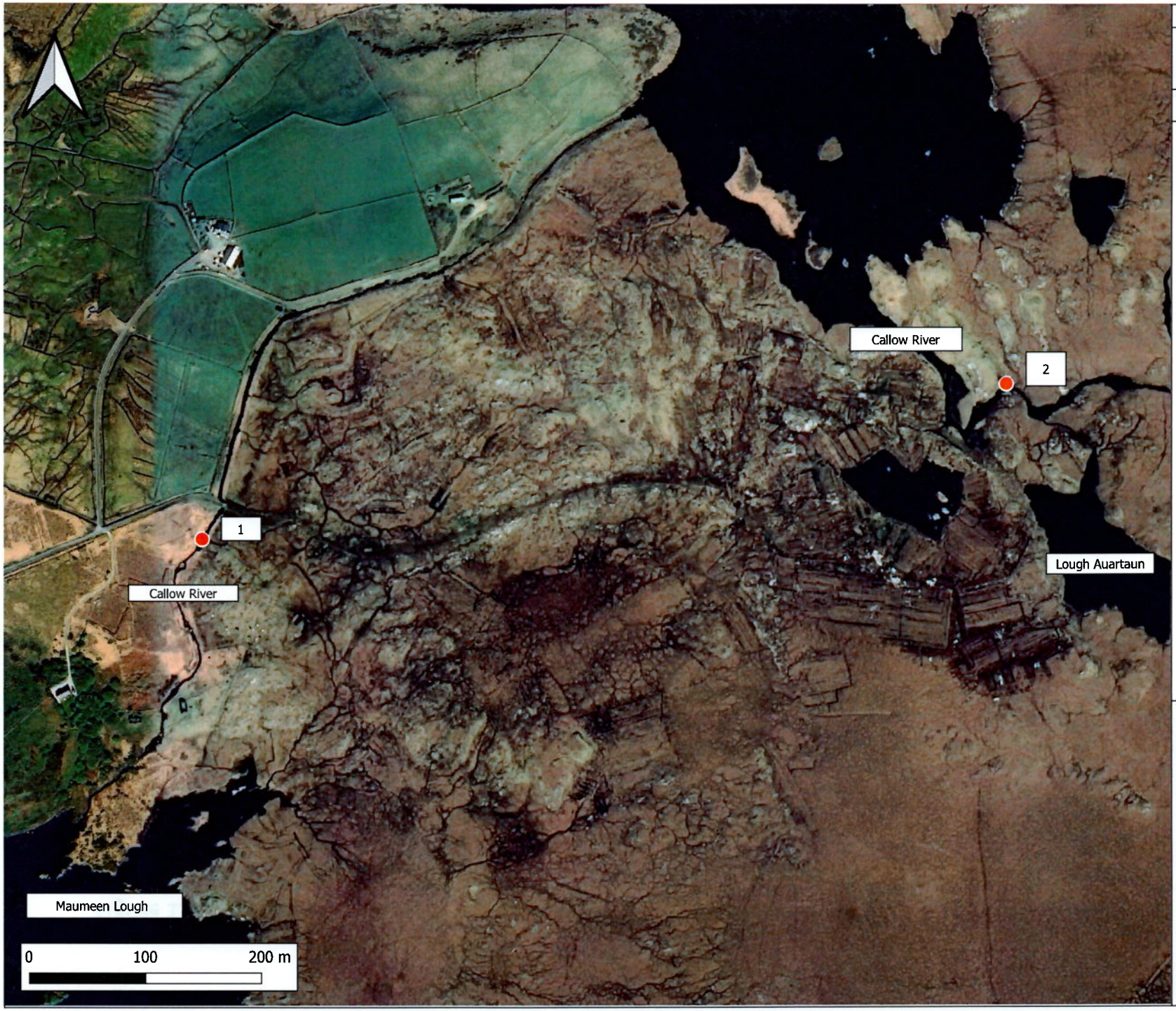
NPWS (2013) Site Synopsis: Inishbofin, Omey Island and Turbot Island SPA [004231]. First Order Site-specific Conservation Objectives Version 1.0. Department of Housing, Local Government and Heritage.

Pulg, U., Vollset, K.W. and Lennox, R.J. (2019) "Linking habitat to density-dependent population regulation: How spawning gravel availability affects abundance of juvenile salmonids (Salmo trutta and Salmo salar) in small streams," *Hydrobiologia*, 841(1), pp. 13–29. Available at: https://doi.org/10.1007/s10750-019-03997-1.

Pulg, U. *et al.* (2021) "Long-term effects and cost-benefit analysis of eight spawning gravel augmentations for Atlantic salmon and Brown Trout in Norway," *Hydrobiologia*, 849(2), pp. 485–507. Available at: https://doi.org/10.1007/s10750-021-04646-2.

5.0 FIGURES

Figure 1: Site Location



NOTES

1. Base Mapping: OpenStreetMap © (www.openstreetmap.org/copyright)
2. CYAL50316488
© Ordnance Survey Ireland/Government of Ireland.

LEGEND

Site Location

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www.slrconsulting.com

INLAND FISHERIES IRELAND

APPROPRIATE ASSESSMENT SCREENING

DOHULLA RIVER CATCHMENT, CONNEMARA, CO.GALWAY

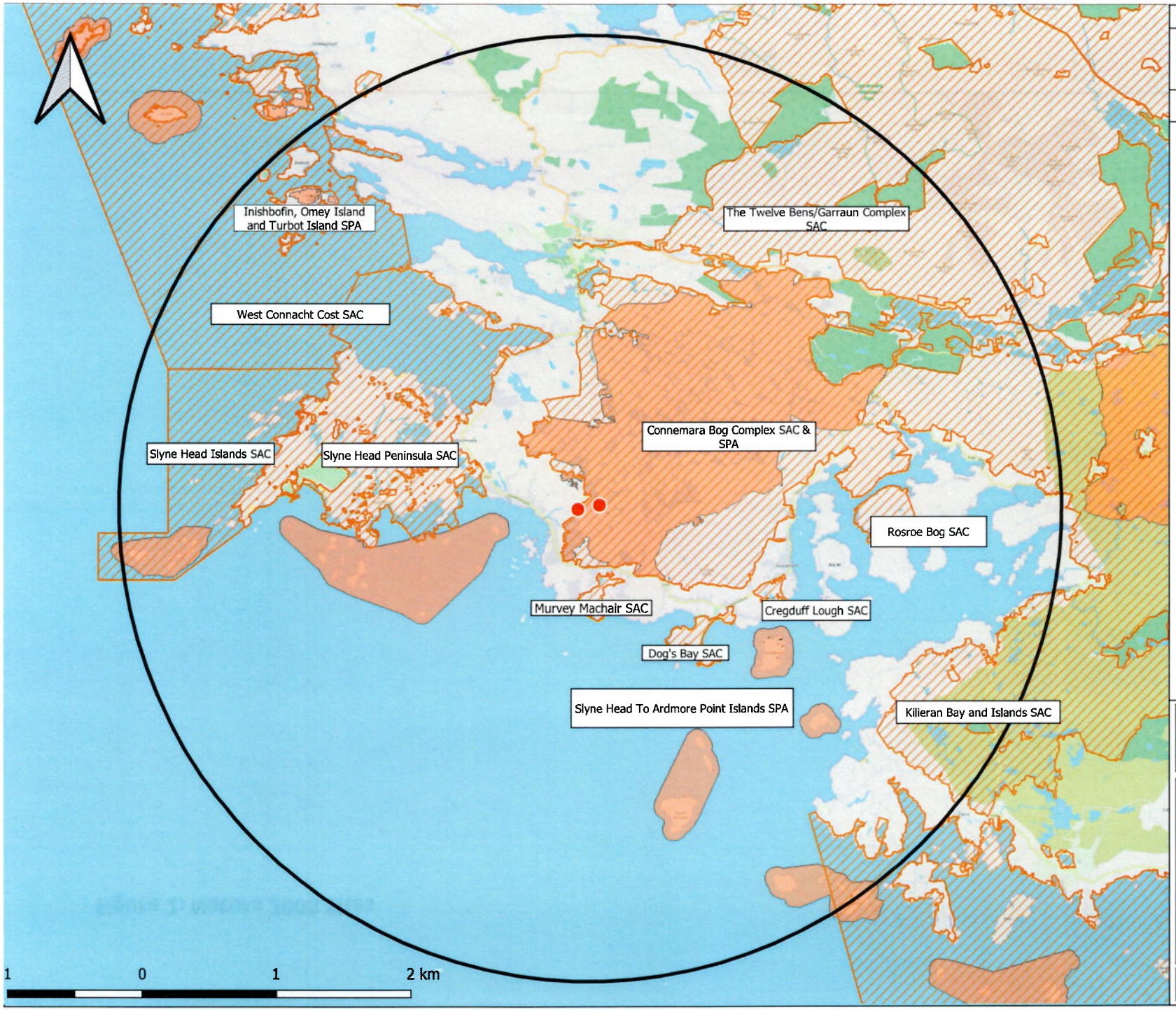
SITE LOCATION MAP

FIGURE 1

Scale	Date
1:50000 @ A3	SEPTEMBER 2023

SLR Projects\00416 Inland Fisheries Ireland\064732 Western Game Anglers Connemara\Dohulla River Catchment AA

Figure 2: Natura 2000 Sites



NOTES

1. Base Mapping: OpenStreetMap © (www.openstreetmap.org/copyright)
2. CYAL50316488
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LEGEND

- Site Location
- Special Areas of Conservation (SAC)
- Special Protection Area (SPA)
- 15km Radius Buffer

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INLAND FISHERIES IRELAND

APPROPRIATE ASSESSMENT SCREENING

DOHULLA RIVER CATCHMENT, CONNEMARA, CO.GALWAY

NATURA 2000 SITES MAP

FIGURE 2

Scale: 1:50000 @ A3

Date: FEBRUARY 2023

SLR Projects\00416 Inland Fisheries Ireland\064732 Western Game Anglers Connemara\Dohulla River Catchment AA

Appendix A: Inland Fisheries Ireland Standard Operating Procedures

Iascach Intíre Éireann
Inland Fisheries Ireland

Standard Operating Procedure

Cleaning of gravels and spawning habitat maintenance

May 2020

Name of Document:					
Author (s):		Fergus Lynch, Cornelius McMahon, Ronan Cusack			
Description of Content:		SOP for cleaning gravels and spawning habitat maintenance			
Approved by:		Milton Matthews			
Date of Approval:					
Revisions					
Revision Nr	Status	Revised by	Reviewed by	Approved by	Date
1	Active	Liam Gavin			22/10/20

1.0 Introduction

River beds that are usually suitable for the spawning of salmonids will occasionally become unsuitable as a result of the presence of fine silt, the washing away of gravels or the growth of weeds. Increased fine sediment loads in river catchments are commonly associated with intensive land management practices such as agriculture and forestry, where tilling, etc., may be practised right up to the edge of the river bank, facilitating washing of clays due to overland flow after heavy rainfall. Reducing the source of fine sediment delivery to rivers such as through changes in agricultural practices is more sustainable for managing excessive river sedimentation (Bašić, et al., 2017) particularly in the context of the WFD. IFI recommends the holistic approach of flushing out of gravels over time through natural flow velocity and spawning activity.

In certain circumstances when the source of the siltation or increased vegetation is removed and the problem rectified, Inland Fisheries Ireland may decide to take action to enhance the suitability of river beds for spawning. These circumstances may be necessary as a "once-off" but in areas where compaction persists such as limestone drought prone catchments, work to improve physical habitat may be required.

This Standard Operating Procedure describes how some of those actions should be carried out. All work must be justified, sustainable and risk assessed with appropriate mitigation measures to prevent any downstream migration of silt. In addition before making this decision it may be necessary to carry out an Appropriate Assessment. Please refer to the Standard Operating Procedure on working in Natura 2000 sites to see if Appropriate Assessment (AA) is required. If AA is required, the action should not take place until this process has been completed.

1.1 **Personal protective equipment:**

The Personal Protection Equipment identified in the Risk Assessment for the activity should be worn. These may include the following: high visibility jacket, Waders, gloves, protective eyewear, and ear protection. Antiseptic hand gel and wipes may also be required to protect against water borne diseases disease, cuts and grazes.

1.2 Equipment / Hand-tools:

Pruning shears / Heavy duty garden rake or drag / Petrol hedge trimer / Three prong fork / Chainsaw / Slash-hook / Hedge clippers

1.3 Equipment / Mechanical:

Long reach digger / Bush-cutting flail / Riddle bucket / Teleporter

1.4 Time of year:

Cleaning of gravels can only be done from 1st July through to the 30th September each year. . This allows enough time for that particular years fry to mature and yet gives adequate time to complete the work before trout or salmon return to spawn.

1.5 Selective pruning:

Please refer to the Standard Operating Procedure for hedge pruning and tree management for the land based removal of bankside vegetation. This SOP describes how to remove bankside vegetation from the river side.

Care and consideration needs to be given when removing bankside vegetation. Not all overhanging branches and shrubbery needs to be removed as this provides much needed cover for juvenile fish during low water periods of the summer. As a general guide, trees should be retained and only light pruning undertaken to achieve the ideal riverine shading requirement of 50%. Pollarding can be considered in some cases. DO NOT OVERPRUNE. The aim for all projects should be to "cool" the river or keep the river "cool" with sufficient shading to mitigate for the effects of climate change. In addition when water levels are low juvenile fish are extremely vulnerable to predation from birds such as gulls and the Grey Heron.

1.6 Instream Vegetation:

Instream vegetation is an important component of aquatic ecosystems providing habitat and food for a wide range of aquatic organisms. A low gradient lowland channel is likely to have marginal and instream weed growth, deep water and low velocity facilitating a habitat suited to a range of coarse fish, to pike and to adult brown trout. There is little point in trying to create salmonid spawning habitat in a flat, lowland channel.

Excessive removal of vegetation may significantly reduce habitat for aquatic insects to shelter and survive, which may impact on food available to both adult and juvenile fish. It is important to determine the cause of excessive weed growth if present on spawning ground, as it may be caused by excess nutrients and therefore instream works to remove vegetation would not be appropriate until the cause is eliminated. In this case, riparian measures, such as fencing and buffer strips would be more appropriate as the riparian shading would limit instream growth .

2.0 The Procedure

2.1 Manual maintenance on a spawning channel

All work must be justified, sustainable and risk assessed with appropriate mitigation measures to prevent any downstream migration of silt. The consideration of other sustainable long term catchment wide measures prior to undertaking manual maintenance is required. In most instances, a holistic approach to improving the overall health of the ecosystem, rather than targeted enhancement for specific species (FAO, 2008) is recommended

In drained channels Brew and Gilligan (2019) recommend selective vegetation removal by retaining as much in stream as possible, e.g. retain a band of emergent vegetation on both sides at the water's edge, retain one third to one half of instream floating type vegetation such as Ranunculus sp. (EP7 and EP8 –OPW/IFI guidance (Brew and Gilligan, 2019).

The manual removal of both instream and bankside vegetation is normally a three person job and should not be carried out in more than 1meter depth of water. A starting point is first selected and the lead person moves upstream opening up the channel by cutting back both banks with the assistance of either a hedge clippers, a petrol hedge

trimmer or a chainsaw. In some cases where tunnelling has occurred along a river or stream, selective bank clearance may be required to allow a balance of light and shade to be created.

The material that is cut away is allowed to fall into the channel and the person following behind carefully divides this into small amounts using a heavy duty garden rake. As the small rafts of material are carried downstream in the current, the third person then removes them from the channel with a fork and places them on the river bank. In areas where vegetation cover is excessive, particular care should be given to the amount removed at one time. This particular plant is heavy to lift in large amounts. Good communication is very important between the three workers as not to overload the person downstream.

When spawning gravel is exposed from underneath weed beds it should be examined for compaction. Sometimes sediment builds up in the gravel and fish are unable to utilise it for spawning. To rectify this problem, gravel needs to be loosened up with a garden fork or rake allowing the current in the river or stream to flow through the gravel and wash away unwanted sediment.

2.2 Mechanical maintenance on a spawning channel

In areas where it is not possible to manually remove excessive weed or shrubbery along a river or stream, the assistance of a long reach

digger may be necessary. This work is usually carried out by a contractor or OPW and overseen by IFI personnel. The driver is guided by the fishery officer as what to remove and what to leave. The use of a riddle bucket on a digger is very important as it can carefully remove aquatic weed without disturbing the spawning gravel or the bed of the channel. When the vegetation has been removed and placed on the river bank, the driver then carefully rakes through the gravel with the riddle bucket causing the compacted sediment to wash away in the current. The design of the riddle bucket allows for the gravel to fall through the bottom of the bucket and leaves a perfect environment for spawning salmonids.

On some larger rivers with extensive and defined riffle areas the excavator could be operated in the river, working on the actual gravel bed. On smaller rivers with a regular riffle-glide-pool sequence this method may be practical. On rivers that have an abundance of gravel deposited throughout the system, they possibly do not need any gravel cleaning.

A bush-cutting flail attachment for a digger is often used to cut back dense growth on river banks. With a skilled driver, this attachment can do percussion work and eliminates tunnelling with minimum effort. The material that is left after the flail has finished are usually broken up in small pieces and remain on the bank of the river.

2.3 Replacement of spawning gravel:

SEPA (2002) recommend that creation of spawning habitat should only be considered in seriously degraded channels where spawning habitat is absent; however there may be scope to carry out such works in less- or non-degraded channels where justified and sustainable. In drained channels gravels removed during maintenance operations

should be reinstated (Brew and Gilligan, 2019) This can be easily done with the help of a Teleporter. A teleporter has an extendable arm and can deposit large or small amounts of gravel where deemed necessary. Particular care needs to be given when introducing new gravel into a river or stream. It is very important not to put too much gravel in one area as it may interfere with the flow of the river and cause flooding problems in the future. Also the gravel must be spread evenly on the bed of the channel and covered with water at all times. Sometimes during spawning times of the year we may get long periods of frost which result in significant drop in water level. If this occurs and gravel becomes exposed ova can be lost. Expert geomorphological advice and design is required for this measure.

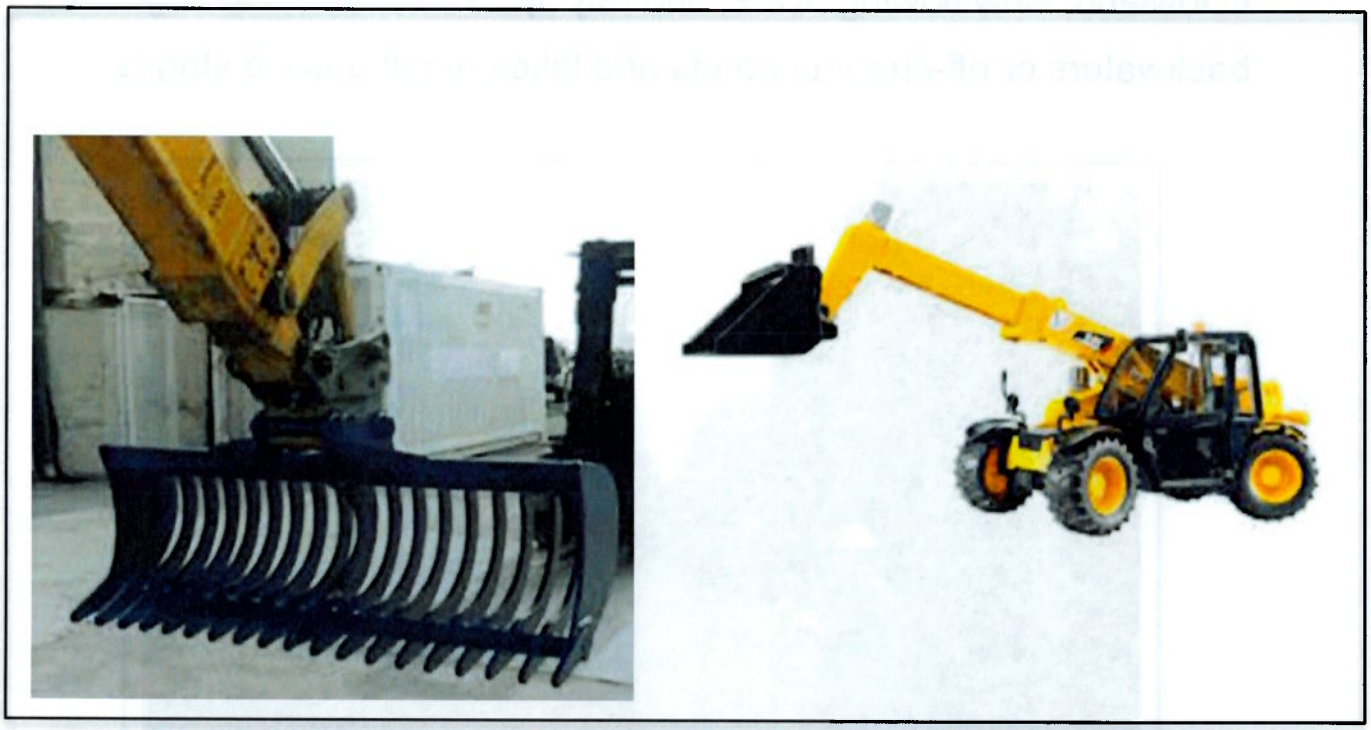
Gravel size should be selected carefully, as trout and Salmon require different sized stone to successfully cut and form a redd for spawning. For Trout, gravel of between 5mm and 50mm in diameter should be used (pea to egg size gravel). For Salmon gravel of between 5mm and 70mm in diameter (gravel/cobble) should be used. Spawning gravel should be rounded, washed and sourced locally if possible. Adult brook, river and sea lamprey require clean gravels, sand and small stone substrate with flow through the sediment when spawning (Maitland, 2003). Sea lampreys require larger substrate than the other species when spawning (comprising of sand, gravel and cobble)

(Joint Nature Conservation Committee, 2015). Shad spawning sites have been identified as fast flowing, shallow and clean gravel/cobble beds (Maitland, 2000). Coarse fish species are found predominantly in lowland, slow flowing rivers, and rely upon sheltered and vegetated backwaters or off-channel ponds and lakes at various life stages.

2.4 Equipment Mechanical:

1. Digger
2. Bush-cutting flail

3. Riddle Bucket
4. Teleporter



2.5 Equipment Hand-tools:

1. Three prong fork
2. Petrol hedge trimmer
3. Heavy duty rake
4. Hedge clippers
5. Pruning shears
6. Drag
7. Slash hook

3.0 References

Bašić, T., Britton, R., Philip Rice, S. and Pledger, A. 2017 Impacts of gravel jetting on the composition of fish spawning substrates: Implications for river restoration and fisheries management. *Ecological Engineering* 107, 71-81.

Brew, T. and Gilligan, N. 2019 *Environmental Guidance: Drainage Maintenance and Construction. Series of Ecological Assessments on Arterial Drainage Maintenance No. 13.* Environment Section, Office of Public Works, Trim, Co. Meath, Ireland

FAO 2008 Rehabilitation of Inland Waters for Fisheries. FAO Technical Guidelines for Responsible Fisheries. No. 6 Suppl. 1, Rome, FAO. 2008. 122p.

Joint Nature Conservation Committee 2015 *Common Standards Monitoring Guidance for Freshwater Fauna. Version* October 2015. 91pp.

Lenane, R. 2012 *Keeping Rivers Cool. Getting ready for climate change by creating riparian shade. Version 1.* Environment Agency Wales.

Maitland, P.S. 2000 *Guide to Freshwater Fish of Britain and Europe*. Hamlyn, London

SEPA 2002 *Managing River Habitats for Fisheries – A Guide to Best Practice.* Scottish Environmental Agtency.

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