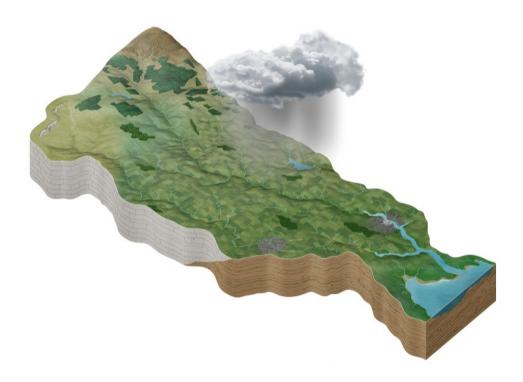
3<sup>rd</sup> Cycle Draft Errif-Clew Bay Catchment Report (HA 32)



### **Catchment Science & Management Unit**

### **Environmental Protection Agency**

August 2021

Version no. 1



### Preface

This document provides a summary of the water quality assessment outcomes for the Errif-Clew Bay Catchment, which have been compiled and assessed by the EPA, with the assistance of the Local Authority Waters Programme (LAWPRO), local authorities and RPS consultants to inform the draft 3<sup>rd</sup> Cycle River Basin Management Plan. The information presented includes status and risk categories of all waterbodies, details on protected areas, significant issues, significant pressures, source load apportionment modelling and load reduction assessments for nutrients where applicable, an overview of the 2<sup>nd</sup> Cycle Areas for Action and a list of proposed 3<sup>rd</sup> Cycle Areas for Action. These characterisation assessments are largely based on information available to the end of 2018, including the WFD Status Assessment for 2013-2018. Protected Area assessments are based on water quality information up to 2018 for Natura 2000 and Salmonid Waters; 2019 for Drinking Water; and 2020 for Nutrient Sensitive Areas and Bathing Waters.

The purpose of this draft report is to provide an overview of the situation in the catchment, draw comparison between Cycle 2 and Cycle 3, and help support the draft River Basin Management Plan 2022-2027 consultation process. Once the consultation process is completed the report will be finalised to reflect any changes and comments made as a result of the consultation process.

Water Framework Directive	<ul> <li>key dates and terminology</li> </ul>
Cycle 2 – EPA Characterisation and Assessment	Characterisation and assessment to inform the Cycle 2 RBMP was largely based on 2010-2015 WFD monitoring data.
Cycle 2 Catchment Assessments	Catchment Assessments based on the Cycle 2 characterisation and assessment were published in September 2018.
2 <sup>nd</sup> Cycle River Basin Management Plan (RBMP) 2018-2021	This plan was for WFD Cycle 2 which runs from 2016-2021. This RBMP was published late, with this plan covering 2018-2021.
2 <sup>nd</sup> Cycle Areas for Action	These 189 Areas for Action were selected under the RBMP 2018-2021
Cycle 3 -EPA Characterisation and Assessment	Cycle 3 runs from 2022-2027. Assessments to inform the Cycle 3 RBMP is largely based on 2013-2018 WFD monitoring data. This is the latest WFD monitoring assessment period for which all data are available.
Cycle 3 Catchment Assessments	Catchment Assessments based on the Cycle 3 characterisation and assessment were published in August 2021.
3 <sup>rd</sup> Cycle River Basin Management Plan 2022- 2027	This draft RBMP is for WFD Cycle 3 which runs from 2022-2027. Public consultation on this plan by the DHLGH and LAWPRO is taking place in late 2021 and early 2022.
3 <sup>rd</sup> Cycle Recommended Areas for Action – Protection/ Restoration/Projects	These recommended Areas for Action have been identified in the draft RBMP 2022-2027 and feedback can be given in the public consultation on this plan. They fall into 3 categories – Areas for Protection, Areas for Restoration and Catchment Projects.

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### **1** Introduction

This report aims to provide an overview of the water quality status, risk, key issues and significant pressures for all waterbodies in the catchment based on the Characterisation Assessment undertaken for the  $3^{rd}$  Cycle River Basin Management Plan. In addition, a comparative overview of the water quality in the Errif-Clew Bay catchment between Cycle 2 and Cycle 3 characterisation is provided along with a summary of the progress made in the  $2^{nd}$  Cycle Areas for Action. The recommended list for the  $3^{rd}$  Cycle Areas for Action is also provided.

To provide context, the Errif-Clew Bay catchment includes the area drained by the River Erriff and all streams entering tidal water between Slyne Head, County Galway and Corraun Point, Co. Mayo, draining a total area of 1,504km (Figure 1). The largest urban centre in the catchment is Westport. The other main urban centres in this catchment are Clifden, Newport and Louisburgh. The total population of the catchment is approximately 23,747 with a population density of 16 people per km<sup>2</sup>. The catchment includes many mountainous areas, all of which are underlain by assorted metamorphic rocks. Conversely, the drumlinised lowland area east of Clew Bay is underlain by pure karstified limestones.

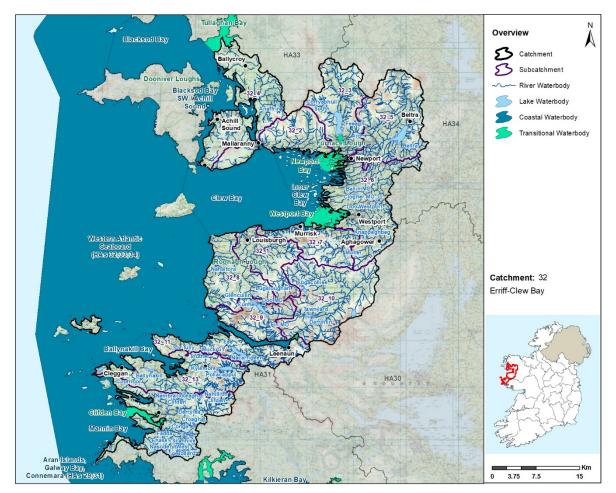


Figure 1: Overview of subcatchments in the Errif-Clew Bay catchment

The Errif-Clew Bay catchment is divided into 13 subcatchments (Figure 1) with 80 river waterbodies, 80 lakes, 11 transitional, 10 coastal waterbodies and 22 groundwater bodies (Figure 2).

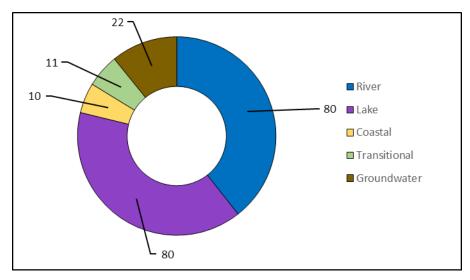


Figure 2: Waterbody types and numbers in the Errif-Clew Bay Catchment.

### 2 Waterbody Overview

### 2.1 Waterbody Status

- This assessment to inform the 3<sup>rd</sup> Cycle RBMP is largely based on WFD monitoring data for the period 2013-2018, which is the latest WFD monitoring assessment period for which all data are available.
- For this assessment to inform Cycle 3, there are 22 waterbodies achieving High status, 54 achieving Good Status, 16 achieving Moderate Status, seven achieving Poor Status and there are no Bad Status waterbodies. There are 104 waterbodies that do not have Status assigned for Cycle 3. All waterbodies must achieve at least Good Ecological status.
- There are five lake waterbodies, five transitional waterbodies, one coastal waterbody and 23 river waterbodies that must achieve High Ecological Status (HES) in this catchment. These waterbodies are listed in Appendix 1. Of the 34 HES Environmental Objective waterbodies, 16 are achieving High Status (three lake waterbodies and 10 river waterbodies) while 11 are at Good Status, three are at Moderate Status, two are at Poor Status and there are no waterbodies at Bad Status.
- There have been reductions of three waterbodies achieving High Status, seven waterbodies achieving Good Status and one waterbody (Aughrusbeg lake waterbody) achieving Bad Status between Cycle 2 and Cycle 3. There have been increases in eight waterbodies (four river waterbodies, three lake waterbodies and one coastal waterbody) achieving Moderate Status and three waterbodies (two river waterbodies and one lake waterbody) achieving Poor Status (Figure 3 & Table 1).

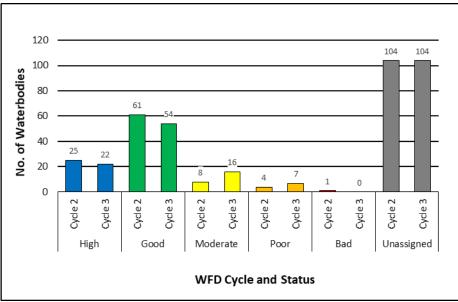


Figure 3: Waterbody Status Breakdown (All waterbodies)

Table 1: Waterbody Status Breakdown Table (All Waterbodies)

River		Lake		Trans	Transitional		Coastal		Groundwater		Total	
2013-2018	Cycle	Cycle	Cycle	Cycle	Cycle	Cycle	Cycle	Cycle	Cycle	Cycle	Cycle	Cycle
Status	2	3	2	3	2	3	2	3	2	3	2	3
High	16	14	4	3	5	4	0	1	0	0	25	22
Good	26	23	10	8	1	1	3	1	21	21	61	54
Moderate	7	11	1	4	0	0	0	1	0	0	8	16
Poor	3	5	0	1	0	0	0	0	1	1	4	7
Bad	0	0	1	0	0	0	0	0	0	0	1	0
Un-												
assigned	28	27	64	64	5	6	7	7	0	0	104	104
Total	80	80	80	80	11	11	10	10	22	22	203	203

- Figure 4 illustrates the change in status between Cycle 2 (assessment based largely on 2010-2015 WFD Monitoring data) and Cycle 3 (assessment largely based on 2013-2018 WFD monitoring data.
- Over this period, nine (9%) waterbodies have improved in status, 70 (71%) waterbodies have remained unchanged and 19 (19%) waterbodies have declined in status.<sup>1</sup>
- There is an overall decline in the status of 10 waterbodies across the catchment since the Cycle 2 assessment.

<sup>&</sup>lt;sup>1</sup> Unassigned waterbodies have not been considered in this Status class change assessment and therefore are not represented in Figure 4. Percentage displayed in the Figure 4 are in relation to the total number of waterbodies with status assigned in both cycles, as opposed to total number of all waterbodies.

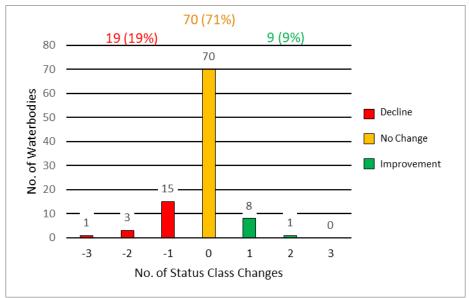


Figure 4: Status Class Changes between Cycle 2 and Cycle 3

### 2.2 Protected Areas

#### 2.2.1 Drinking Water

- There are 15 surface waterbodies in the catchment identified as Drinking Water Protected Areas (DWPA) based on water abstraction data on the abstraction register and from other sources in 2018. All groundwater bodies nationally are identified as DWPA. DWPA layers can be viewed at <a href="https://gis.epa.ie/EPAMaps/Water-see Protected Areas-Drinking Water">https://gis.epa.ie/EPAMaps/Water-see Protected Areas-Drinking Water</a>.
- One river waterbody and one lake waterbody in the catchment did not meet the DWPA objective in 2019:
  - Newport (Mayo)\_030 (IE\_WE\_32N010190) river waterbody is the source for the Newport Puplic Water Supply (2200PUB1022) which had MCPA and Glyphosate pesticide exceedances and;
  - Tully (IE\_WE\_32\_474) lake waterbody is the source for Tully-Tullycross public water supply which had MCPA pesticide exceedances.
- For more detailed information please see the EPA reports on drinking water quality in 2019 for <u>Public Supplies<sup>2</sup></u> and <u>Private Supplies<sup>3</sup></u>.

#### 2.2.2 Bathing Waters

- There are seven bathing waters in or directly adjacent to the catchment identified under the Bathing Water Regulations 2008.
- Three bathing waters (Clare Island Louisburgh, Mulranny Beach & Carrowmore Beach Louisburgh) had an excellent classification for 2020, three (Carrowniskey Louisburgh, Old Head

<sup>&</sup>lt;sup>2</sup><u>https://www.epa.ie/publications/compliance--enforcement/drinking-water/annual-drinking-water-reports/drinking-water-quality-in-public-supplies-2019.php</u>

<sup>&</sup>lt;sup>3</sup><u>https://www.epa.ie/publications/compliance--enforcement/drinking-water/annual-drinking-water-reports/focus-on-private-water-supplies-2019.php</u>

Beach – Louisburgh & Bertra Beach – Murrisk) had a Good classification and the remaining bathing water (Clifden Beach) had a Poor classification.

• For more detailed information please see the EPA report on <u>bathing water quality in 2020</u><sup>4</sup>.

#### 2.2.3 Shellfish Areas

- There are eight designated shellfish areas in the catchment.
- The Marine Institute assessed the average dissolved concentrations for metals in shellfish waters for the period 2016-2019 and the microbial quality in shellfish flesh for 2018. This assessment was used to determine if the WFD protected area objective for shellfish areas was met.
- Details on the shellfish area and its associated waterbody is summarised in Table 2.

Table 2: Designated shellfish areas in the catchment

Shellfish /	Area	Water Body	Objective met?		
Name Code		Name	Code	Yes	No
		Newport Bay	IE_WE_350_0200		
Clew Bay (East of Old	IEPA2 0006	Westport Bay	IE_WE_350_0100	1	
Head)	1LI A2_0000	Inner Clew Bay	IE_WE_350_0000		
		Clew Bay	IE_WE_340_0000		
Killary Harbour	IEPA2_0011	Erriff Estuary	IE_WE_310_0100		✓
Kind y Harbour		Killary Harbour	IE_WE_310_0000		·
Clifden Bay/Ardbear	IEPA2_0026	Clifden Bay	IE_WE_270_0100		
Вау		Western Atlantic Seaboard	IE_WE_250_0000	-	
Streamstown	IEPA2_0027	Western Atlantic Seaboard	IE_WE_250_0000	1	
Ballinakill	IEPA2_0028	Ballynakill Bay	IE_WE_300_0000	1	
Mannin Bay	IEPA2_0025	Mannin Bay	IE_WE_260_0000	~	
Achill Sound North	IEPA2_0030	Blacksod Bay SW/ Achill Sound	IE_WE_370_0000	4	
Achini Sound North		Blacksod Bay	IE_WE_360_0000	•	
Achill Sound South	IEPA2_0029	Blacksod Bay SW/ Achill Sound	IE_WE_370_0000	~	

The locations of Protected Areas associated with Public Health (Drinking Water, Bathing Water and Shellfish Areas, where applicable) are illustrated in Figure 5 below.

<sup>&</sup>lt;sup>4</sup><u>https://www.epa.ie/publications/monitoring--assessment/freshwater--marine/bathing-water-quality-in-ireland-2020-.php</u>

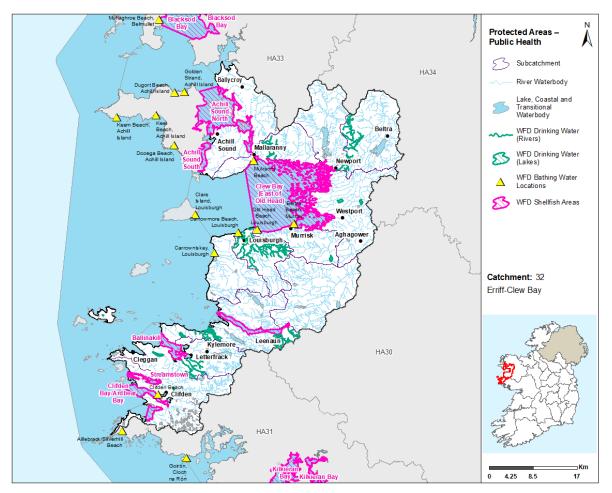


Figure 5: Protected Areas – Public Health

#### 2.2.4 Natura 2000 Sites

- Many of the habitats and species listed for protection in the Birds and Habitats Directives are water dependent. The Special Protection Areas (SPAs) and Special Areas of Conservation (SACs) with water dependent habitats or species in this catchment are presented in Figure 6, along with waterbodies designated as salmonid waters (S.I. No. 293 of 1988) and waterbodies with Fresh Water Pearl Mussel habitat, where identified.
- There are 25 SACs in this catchment, 22 of which have water dependent habitats or species. The waterbodies within these SACs were assessed for associated water dependent habitats and species and if they met the supporting requirements for habitats and species using their 2013-2018 WFD status. For the purposes of the assessment, it was assumed that Good ecological status is adequate to meet the supporting conditions of all habitats and species with the exception of the Freshwater Pearl Mussel, which has additional requirements for supporting conditions set out in the Freshwater Pearl Mussel Regulations (S.I. No 296 of 2009) for macroinvertebrates, filamentous algae, phytobenthos, macrophytes and siltation.
- Specific water supporting conditions have not been identified for the dependent bird species in the SPAs and so waterbodies associated with SPAs are not included in this assessment.

Results of the overall assessment for this catchment are outlined in

Table 3 below, information at a waterbody level can be viewed at <u>Catchments.ie</u>.<sup>5</sup>

Water Body Type	Total No.	Meeting the Requirements	Did not meet the Requirements	Unknown*
Rivers	67	33	15	19
Lakes	64	6	4	4
Transitional & Coastal	16	10	5	1

Table 3: Natura 2000 Network Assessment Summary

\*As the waterbody status was unassigned.

- There are eight river waterbodies with FWPM habitats, four of which (Bundorragha\_010, Bundorragha\_020, Newport (Mayo)\_020 & Newport (Mayo)\_030 had achieved the required macroinvertebrate standard as set out in the FWPM Regulations.
- There are no groundwater bodies delineated and assessed as Groundwater Dependent Terrestrial Ecosystems for this catchment.
- Water dependent SACs/ SPAs (including FWPM SAC sub-catchments) in the catchment are illustrated in Figure 6.

<sup>&</sup>lt;sup>5</sup>https://www.catchments.ie/download/catchments-assessments-protected-areas-supportingdocuments/

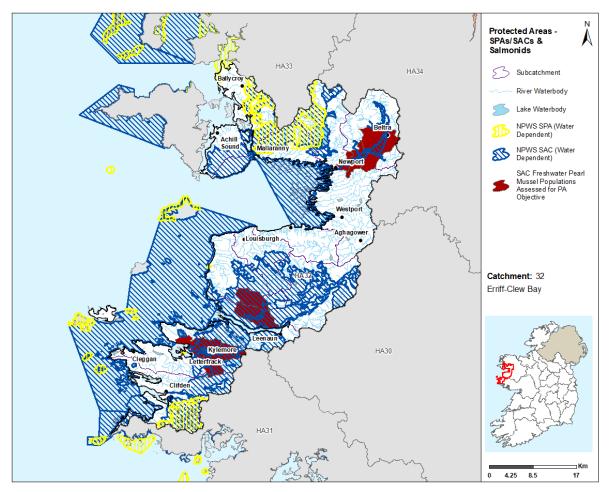


Figure 6: Water Dependent SPAs / SACs

#### 2.2.5 Nutrient Sensitive Areas

• There are no Nutrient Sensitive Areas in the catchment.

### 2.3 Heavily Modified Waterbodies

 Based on the 1<sup>st</sup> and 2<sup>nd</sup> RBMPs there are currently no heavily modified water bodies (HMWBs) in the catchment. There will be a consultation period on HMWBs for the 3<sup>rd</sup> Cycle RBMP and this will be completed for inclusion in the 3<sup>rd</sup> Cycle Final RBMP.

### 2.4 Artificial Waterbodies

• The Errif-Clew Bay Catchment has no artificial waterbodies.

### 3 Waterbody Risk

### 3.1 Overview of Risk

♦ A waterbody that is *At Risk* means that either the waterbody is currently not achieving its Water Framework Directive (WFD) environmental objective of Good or High Ecological Status or that there is an upward trend in nutrients or ammonia and if this trend continues the waterbody Status will decline by the end of Cycle 3 and will fail to meet its environmental objective.

- A waterbody can be considered as *Review* for the following three reasons:
  - The waterbody does not have status assigned to it yet, it is referred to as an unassigned waterbody, and therefore there is not enough evidence to determine if it is *At Risk* or *Not At Risk*.
  - The waterbody has shown some slight evidence or improvement, but more evidence is needed before it can be considered as *Not At Risk.*
  - Measures are planned or have already been implemented for the waterbody and no further measures should be applied until there is enough time to assess if these measures are working.
- A waterbody is *Not At Risk* when it is achieving its environmental objective of either High or Good Status and that there is no evidence indicating that there is a trend towards status decline.
- In total, there are 203 waterbodies in the Errif-Clew Bay Catchment and 28 (14%) are currently At Risk, 52 (26%) in Review and 123 (61%) are Not At Risk.

### 3.2 Surface Waters

- For the 80 rivers waterbodies, 21 (26%) are At Risk, 23 (29%) are in Review and 36 (45%) are Not At Risk.
- For the 80 lake waterbodies, six (8%) are At Risk, 19 (24%) are in Review and 55 (69%) are Not At Risk.
- For the 11 transitional waterbodies, five (45%) are in *Review* and six (55%) is *Not At Risk*.
- For the 10 coastal waterbodies, three (30%) are in *Review* and seven (70%) are *Not At Risk*.
- The largest proportion of *At Risk* waterbodies are found in river waterbodies, accounting for 21 (75%) of 28 *At Risk* waterbodies. Figure 7 gives an overview of the breakdown of risk across waterbody types for both Cycle 2 and Cycle 3.
- Overall, there is an increase in nine *At Risk* waterbodies and three *Review* waterbodies, and a reduction of 12 *Not At Risk* waterbodies between Cycle 2 and Cycle 3.

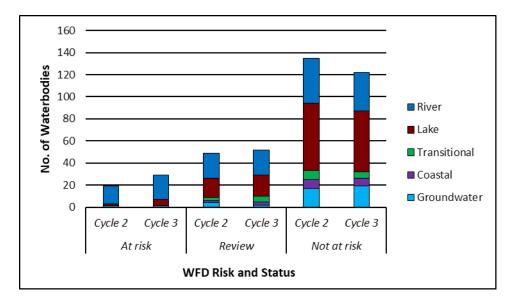


Figure 7: Number of waterbodies in each risk category

 The location of the At Risk, Review and Not At Risk surface waterbodies for Cycle 3 are shown in Figure 8 while the surface waterbodies that have experienced a change in risk between Cycle 2 and Cycle 3 are shown in Figure 9.

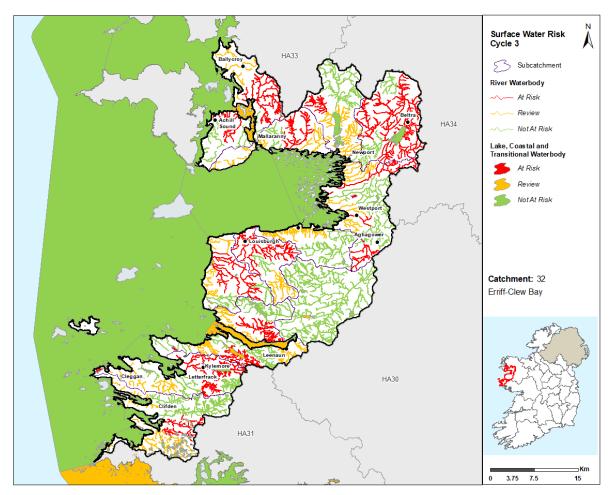


Figure 8: Surface Water Risk Cycle 3

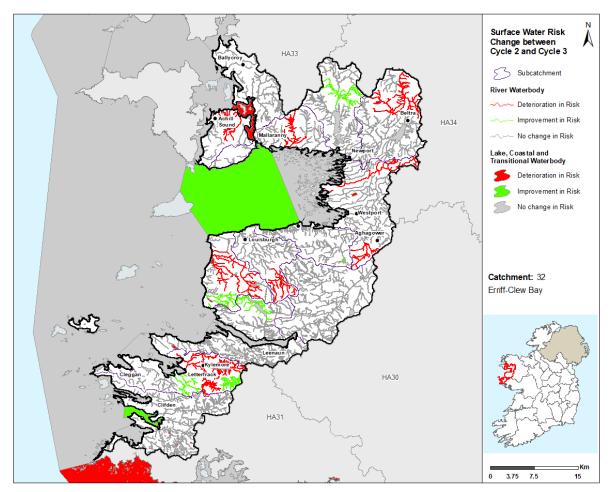


Figure 9: Surface Water Risk Change between Cycle 2 and Cycle 3

### 3.3 Groundwater

- For the 22 groundwater bodies, one (5%) is *At Risk* (Waste Facility (W0021-01)), two (9%) are in *Review* and 19 (86%) are *Not At Risk*.
- In Cycle 2 there was one groundwater body (Waste Facility (W0021-01)) At Risk in this catchment, four in Review and 17 Not At Risk.
- The location of the *At Risk, Review and Not At Risk* groundwater bodies for Cycle 3 are shown in Figure 10.

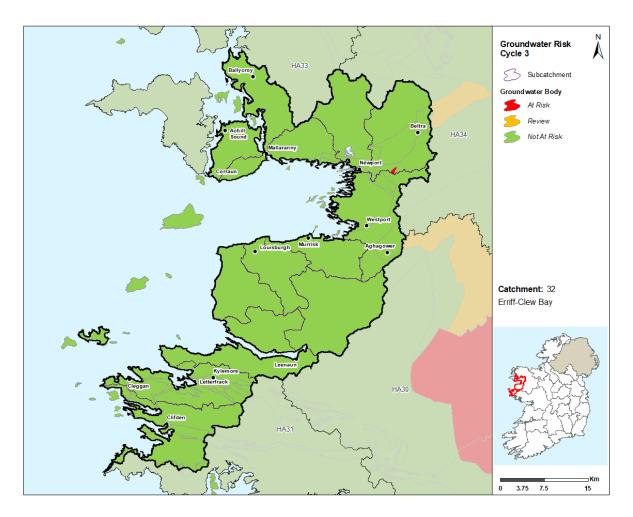


Figure 10: Cycle 3 Groundwater Body Risk

### 3.4 Heavily Modified Waterbodies

 There are no heavily modified water bodies (HMWBs) in the catchment. There may be changes to HMWB designation once the Cycle 3 HMWB assessment has been completed and consulted on for the 3<sup>rd</sup> Cycle Final RBMP.

### **3.5** Artificial Waterbodies

• As stated in Section 2.4, there are no artificial waterbodies in the Errif-Clew Bay Catchment.

### 4 Significant Issues in *At Risk* Waterbodies

#### 4.1 All Waterbodies

- Excess nutrients and morphological impacts remain the most prevalent issues in the Errif-Clew Bay catchment (Figure 11) with each impacting 23 and 14 waterbodies in Cycle 3. Sediment is impacting 12 waterbodies, hydrological impacts four waterbodies, while chemical and other issues are impacting two and three waterbodies respectively.
  - For river waterbodies, the main significant issues are nutrient pollution (17), morphological impacts (14), sediment (10), hydrological (4), other issues (2) and organic pollution (1).

- For lake waterbodies, the main significant issues are nutrient pollution (5), sediment (2) and chemical pollution (2).
- For the one *At Risk* groundwater body (Waste Facility (W0021-01)) the significant issues are nutrient pollution and diminution of quality of associated surface waters for chemical reasons.
- Between Cycle 2 and Cycle 3, the number of waterbodies with nutrients issues have increased by eight from 16 to 23. Sediment was impacting three waterbodies in Cycle 2 and is impacting 12 in Cycle 3. The number of waterbodies impacted by morphological issues has remained at 14 waterbodies.
- The numbers of waterbodies with hydrological issues has reduced from seven in Cycle 2 to four in Cycle 3.

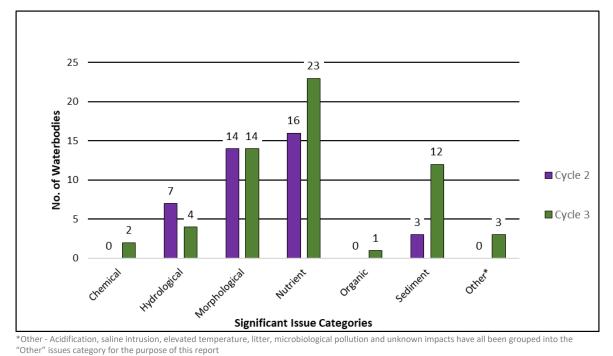


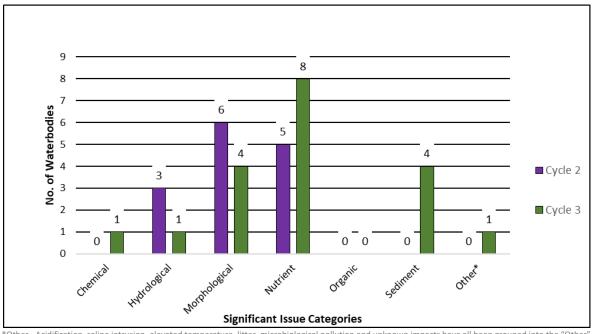
Figure 11: Significant Issues across all At Risk WBs between Cycle 2 and Cycle 3

### 4.2 High Status Objective Waterbodies

- In Cycle 3 for High Status Objective waterbodies nutrient pollutions are impacting eight of the 12 High Status Objective waterbodies currently At Risk (Figure 12). Both morphological and sediment issues are impacting four waterbodies each, while hydrological issues have reduced from three waterbodies to one waterbody between the two cycles.
  - $\circ$  For river waterbodies, the main significant issues are nutrient (7), morphological impacts (4), sediment pollution (4), hydrological impacts (1) and other <sup>6</sup>(1).
  - For the one High Status Objective lake waterbody, the significant issues are chemical and nutrient impacts.

<sup>&</sup>lt;sup>6</sup> Acidification, saline intrusion, elevated temperature, litter, microbiological pollution and unknown impacts have all been grouped into the "Other" issues category for the purpose of this report

 Between Cycle 2 and Cycle 3, the number of waterbodies with nutrients and sediment have increased (from five to eight and zero to four respectively) while the number of waterbodies impacted by hydrological and morphological issues have both declined by two waterbodies each.



\*Other - Acidification, saline intrusion, elevated temperature, litter, microbiological pollution and unknown impacts have all been grouped into the "Other" issues category for the purpose of this report

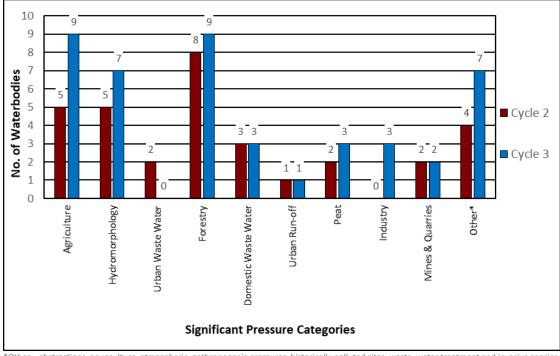
Figure 12: Significant Issues in At Risk High Status Objective Waterbodies

### 5 Significant pressures in At Risk Waterbodies

### 5.1 All Waterbodies

- Where waterbodies have been classed as *At Risk*, significant pressures have been identified.
- Figure 13 shows a breakdown of the number of *At Risk* waterbodies in each significant pressure category.
- The significant pressures affecting the greatest number of waterbodies are agriculture and forestry followed by hydromorphology, other<sup>7</sup>, domestic waste water, peat, industry, mines and quarries and urban run-off.
- When comparing Cycle 2 and Cycle 3 the biggest change is an increase of four waterbodies where agriculture is a significant pressure from five waterbodies in Cycle 2 to nine waterbodies in Cycle 3.

<sup>&</sup>lt;sup>7</sup> Abstractions, aquaculture, atmospheric, anthropogenic pressures, historically polluted sites, waste, water treatment and invasive species have all been grouped into the "Other" pressure category for the purpose of this report



\*Other – abstractions, aquaculture, atmospheric, anthropogenic pressures, historically polluted sites, waste, water treatment and invasive species have all been grouped into the "Other" pressure category for the purpose of this report

#### Figure 13: Significant Pressure (All At Risk Waterbodies)

#### 5.1.1 Pressure Type

#### 5.1.1.1 Agriculture

 Agriculture is a significant pressure in six river waterbodies and three lake waterbodies (Ballin MO, Tully and Knappaghbeg). The issues related to farming in this catchment are diffuse phosphorus loss to surface waters in areas of poorly draining soils and in some cases, intensive agriculture. Sedimentation and nutrient pollution pressures are impacting these waterbodies. There was also a large slurry spill in Knappaghbeg Lake (circa 2000) during which slurry entered the lake resulting in a fish kill. The lake is still in recovery.

#### 5.1.1.2 Forestry

 Forestry has been identified as a significant pressure in nine river waterbodies. The types of problems encountered include for example: losses of sediment and/or nutrients during afforestation, tree felling and abstraction; losses of sediment from access roads; losses of nutrients during aerial fertilisation and impacts from public access. Steep topography around Skerdagh\_010 increases the impact from forestry.

#### 5.1.1.3 Hydromorphology

Hydromorphology is a significant pressure in seven river waterbodies. A range of hydromorphological pressures are impacting the waterbodies. Two waterbodies were impacted by river bank erosion (Bundorragha\_020 and Cartron\_010), the causes of erosion in these locations are due to animal trampling, anglers walking paths and forestry. Similarly, overgrazing is a pressure in three river waterbodies (Culfin\_010, Owengarve (Mayo)\_010 and Owengarve (Mayo)\_020). The Owennabrockagh\_010 is subject to land drainage and channelisation pressures under the Owennabrockagh River Drainage District scheme. Several modifications (channelisation, barriers to fish migration and embankments) are impacting the Bundorragha\_020 river waterbody, while barriers to fish migration are impacting upon the Owengarve (Mayo)\_020 river waterbody also.

High impact from channel modifications for land drainage in areas of peat extraction is noted within the Carrowbeg (Westport)\_010.

#### 5.1.1.4 Other significant pressures

♦ Aquaculture

Aquaculture has been identified as a significant pressure in two river waterbodies (Ballinaboy\_020 and Culfin\_010) and one lake waterbody (Beaghcauneen). The issue relates to a fish farm and the significant issue is unknown.

Anthropogenic

Unknown anthropogenic pressures are impacting three waterbodies. One of these waterbodies is a river waterbody (Bundorragha\_020) and two are lake waterbodies (Aughrusbeg and Nambrackmore Cushatrower).

♦ Waste

An EPA, licensed waste facility (Derrinumera Landfill Facility) has been identified as a significant pressure in one groundwater body, Waste Facility (W0021-01). The waterbody is impacted by organic pollution, specifically ammonia issues.

### 5.1.1.5 Domestic waste water

Domestic waste water has been identified as a significant pressure in three river waterbodies – Derryhorraun\_010, Bunowen (Louisburgh)\_030 and Carrownisky\_020. Galway County Council has noted that although there is low density of septic tank systems, generally the pressure arises through inadequate treatment on poorly draining soils and subsoils. The significant impacts are mainly nutrient loss to surface waters. Discharges from septic tanks are causing issues for bathing waters impacted by the Bunowen (Louisburgh)\_030 and Carrownisky\_020.

#### 5.1.1.6 Peat

Peat drainage and extraction has been identified as a significant pressure in three river waterbodies (Bunowen (Louisburght)\_030, Dawros\_040 and Derryhorraun\_010). Elevated nutrient concentrations and habitat modification due to influx of sediment are the significant issues. Sediment influx due to harvesting is known to be a significant pressure (Sweeney's Bog upstream of catchment) which has resulted in high fish mortality during spawning. This is a problem particularly in areas that are susceptible to flooding.

#### 5.1.1.7 Industry

• An industrial site has been identified as a significant pressure impacting three river waterbodies (Bundorragha\_020, Dawros\_020 and Dawros\_030), with nutrients being the main issue of concern.

Waterbody Code	Waterbody Name	Waterbody Type	Emission Type	Name	Impact
IE_WE_32B01020 0	BUNDORRAGHA_020	River	Section 4	N/A	Nutrient & microbiological
IE_WE_32D01008 0	DAWROS_020	River	Section 4	N/A	Nutrient
IE_WE_32D01010 0	DAWROS_030	River	Section 4	N/A	Nutrient

Table 4: Breakdown of Cycle three Industry Significant Pressures in the Errif-Clew Bay Catchment

#### 5.1.1.8 Mines & Quarries

Quarries have been identified as a significant pressure in two river waterbodies (Newport (Mayo)\_010 and Carrowbeg (Westport)\_030). The significant issue in Newport (Mayo)\_010 relates to sediment loss, whilst in the Carrowbeg (Westport)\_030 there is residual cement stored up against the bank which has impacted the riparian zone.

#### 5.1.1.9 Urban run-off

 Diffuse urban pressures, caused by misconnections, leaking sewers and runoff from paved and unpaved areas in Westport has been identified as a significant pressure in one waterbody, Carrowbeg (Westport)\_030.

Figure 14 – Figure 17 illustrates the locations of waterbodies for the four most common pressures in order of prevalence (agriculture, forestry, hydromorphology and other) within the catchment in Cycle 3.

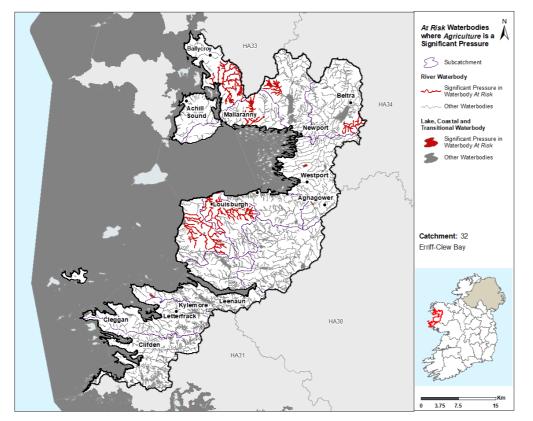
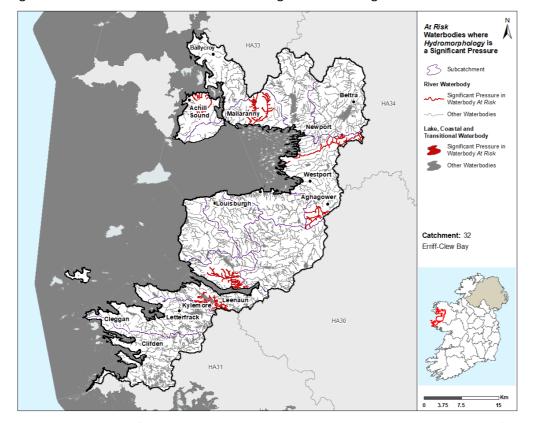


Figure 14: Locations of Waterbodies where Agriculture is a Significant Pressure



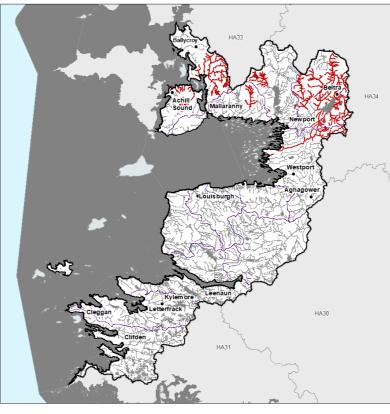


Figure 15: Locations of Waterbodies where Forestry is a Significant Pressure

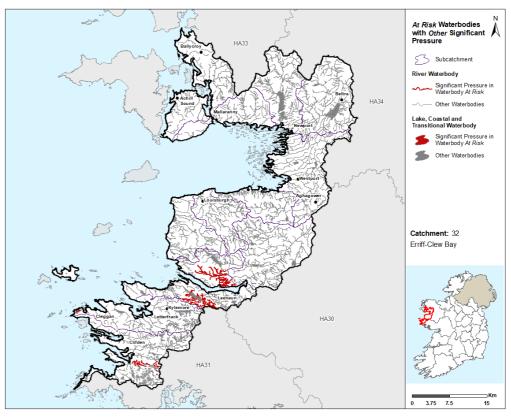
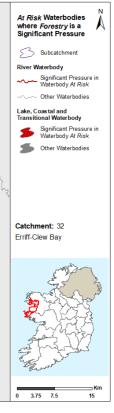
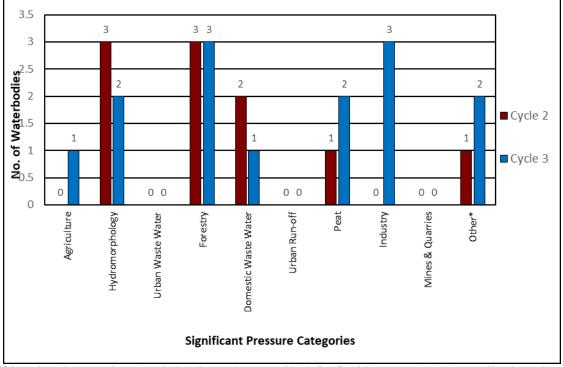


Figure 16: Locations of Waterbodies where Hydromorphological pressures are significant Figure 17: Locations of Waterbodies where Other is a Significant Pressure



### 5.2 High Status Objective Waterbodies

• Forestry and industry are the main significant pressures in High Status Objective waterbodies each impacting three out of the 10 At Risk High Status Objective waterbodies.



\*Other – abstractions, aquaculture, atmospheric, anthropogenic pressures, historically polluted sites, waste, water treatment and invasive species have all been grouped into the "Other" pressure category for the purpose of this report

#### Figure 18: Significant Pressure in At Risk High Status Objective Waterbodies

### 6 Source Load Apportionment Modelling (SLAM)

- The EPA has developed Source Load Apportionment Models (SLAM) for both P and N which estimate the proportion of the phosphorus and nitrogen inputs, respectively, to waters in each catchment that comes from each sector.
- The main data inputs for the model for agriculture are the 2018 land parcel (LPIS) and animal (AIMs) data from the Department of Agriculture Food and the Marine. The Urban Waste Water (UWW) data comes from Irish Water's discharge monitoring data. The model also calculates the inputs from a range of other sectors, including for example, forestry, septic tanks, peat, urban runoff and atmospheric deposition.
- In the catchment land in pasture, peat and forestry is responsible for 44%, 29% and 12% of the nitrogen load respectively while land in peat, pasture and forestry contribute 37%, 31% and 15% of the phosphorus loadings for the catchment respectively (Figure 17).

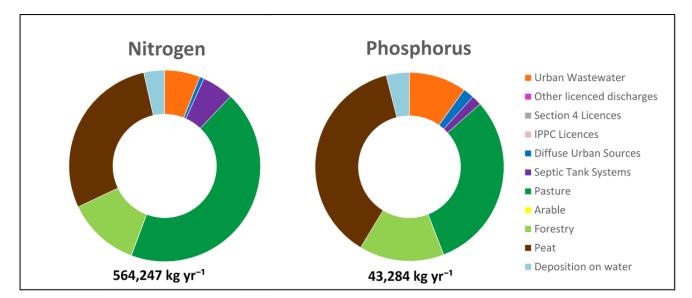


Figure 19: Estimated Proportions of N & P from Each Sector in the Errif-Clew Bay Catchment

### 7 Load Reduction Assessment

#### 7.1 Nitrogen Load Reduction

 An assessment was undertaken to determine if nitrogen reductions in rivers, streams and lakes are required for Transitional and Coastal (TRACs) waterbodies to achieve their WFD environmental objective. The outcome of the assessment indicated that 10 of the 46 catchments require N reductions in our inland waters to restore some TRAC waterbodies. Nitrogen load reduction to meet TRAC WFD objectives are not required in the Errif-Clew Bay catchment.

#### 7.2 Phosphorous / Sediment Load Reduction

• Further modelling work is required to determine if and what P load reductions are required.

Figure 20 highlights areas where agricultural measures for sediment and phosphorus should be targeted. Waterbodies with blue fill are areas where sediment or phosphorus should be targeted. Pollution Impact Potential mapping for both phosphorus and nitrogen in the catchment are provided in Appendix 2.

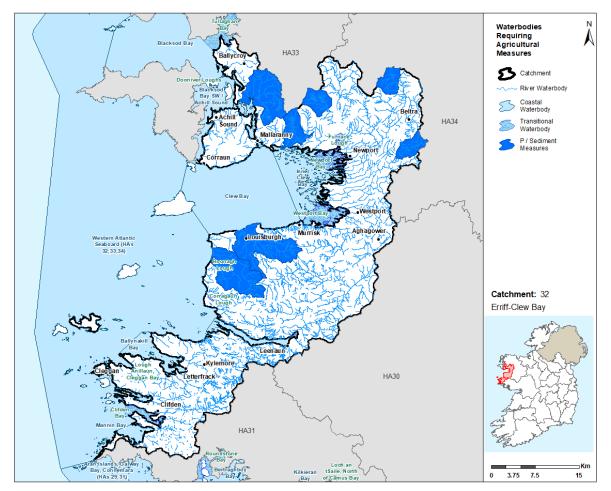


Figure 20: Waterbodies where Agricultural Measures should be Targeted

## 8 2<sup>nd</sup> Cycle Areas for Action

### 8.1 Area for Action Overview

There were five Areas for Action, comprising of 23 waterbodies, selected for further characterisation and action in the catchment for the 2<sup>nd</sup> Cycle River Basin Management Plan. The Areas for Action in the catchment are listed in Table 5 and shown in Figure 21. LAWPRO, in conjunction with local authorities and stakeholders from the Western Regional Operational Committee, have been working in these areas since 2018.

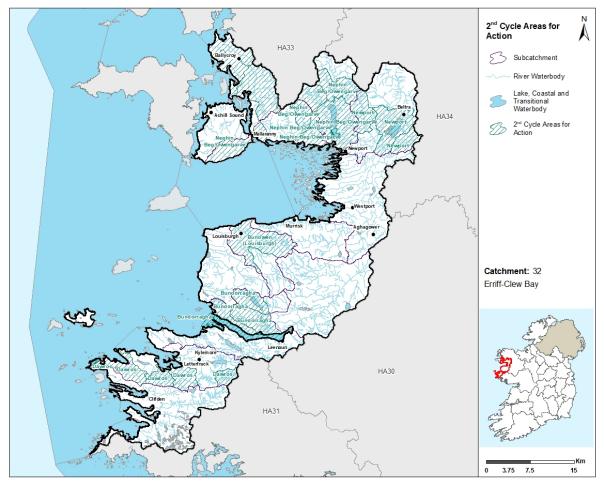


Figure 21: 2<sup>nd</sup> Cycle Areas for Action Locations

2 <sup>nd</sup> Cycle Area for	Number of	Sub-	Local	Reason for Selection
Action	waterbodies	catchment	Authority	
Dawros	5	32_13	Galway	<ul> <li>Includes top 8 Freshwater Pearl Mussel water body.</li> <li>Includes headwaters to top 8 Freshwater Pearl Mussel water body</li> <li>Building on improvements made with respect to forestry activities and septic tanks systems. Two At Risk High Ecological Status objective water bodies.</li> <li>One deteriorated water body.</li> <li>One protected area objective not met: 3110 (Oligotrophic lake).</li> </ul>
Bundorragh 4 32_9 Mayo		Mayo	<ul> <li>Possible quick win – just deteriorated.</li> <li>One deteriorated water body.</li> <li>One At Risk High Ecological Status objective water body.</li> <li>One Review High Ecological Status objective water body.</li> </ul>	

Table 5: 2<sup>nd</sup> Cycle Areas for Action

2 <sup>nd</sup> Cycle Area for	Number of	Sub-	Local	Reason for Selection
Action	waterbodies	catchment	Authority	
				<ul> <li>Two water bodies failing to meet protected area objectives for Freshwater Pearl Mussel.</li> <li>Headwaters to Killary Harbour shellfish area.</li> </ul>
Nephin Beg/Owengarve	10	32_4, 32_2, 32_3	Мауо	<ul> <li>Building on proposed EIP application and strong community groups.</li> <li>Building on improving forestry practices being implemented by the Forest Service and Coillte.</li> <li>Four deteriorated water bodies.</li> </ul>
Louisburgh Bunowen	1	32_1	Мауо	<ul> <li>Building on improvements at Louisburgh WWTP.</li> <li>Discharges into designated bathing water (Carrowmore Beach, Louisburgh)</li> <li>One water body is failing to meet protected area objectives for drinking water.</li> </ul>
Newport	3	32_5	Мауо	<ul> <li>Building on existing work: Local Authority has been active in the catchment already, with respect to agricultural pressures.</li> <li>Two deteriorated water bodies.</li> <li>Two At Risk High Ecological Status objective water bodies.</li> <li>One protected area objective not met: salmon and Freshwater Pearl Mussel (19 of 27 catchments of S.I. 296 2009).</li> <li>Headwaters to Freshwater Pearl Mussel habitat.</li> </ul>

### 8.2 Status Change in 2<sup>nd</sup> Cycle Areas for Action

- For Cycle 3, of the 23 waterbodies in the 2<sup>nd</sup> Cycle Areas for Action, there are two waterbodies at High Status, four waterbodies at Good Status, five waterbodies at Moderate Status, three waterbodies at Poor Status and nine waterbodies where status has not been assigned.
- There is an overall improvement in the status of one of the 2<sup>nd</sup> cycle Areas for Action waterbodies across the catchment.<sup>8</sup>

<sup>&</sup>lt;sup>8</sup> Status class change cannot be calculated for waterbodies where status has not been assigned in either cycle 2 or 3 and therefore these waterbodies are not represented in Figure 18. Percentage displayed in the chart below are in relation to the total number of waterbodies with status assigned in both cycles, as opposed to total number of all waterbodies.

Of the 14 waterbodies within the 2<sup>nd</sup> Cycle Areas for Action which had status assigned, eight experienced no change in status between Cycle 2 and Cycle 3, three waterbodies experienced an improvement and two were subject to deterioration in status (Figure 22). Of the three waterbody improvements two were across Dawros Area for Action and one in Nephin Beg / Owengarve Area for Action. The two waterbodies which experienced decline were in the Newport Area for Action and Bundorragha Area for Action.

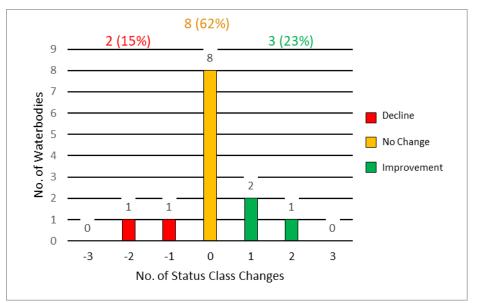


Figure 22: 2<sup>nd</sup> Cycle Area for Action Waterbody Status Class Changes between Cycle 2 and Cycle three

### 8.3 Waterbody Risk in 2<sup>nd</sup> Cycle Areas for Action

- For the 23 waterbodies in the 2<sup>nd</sup> Cycle Areas for Action, nine (39%) of these are currently At Risk, 10 (43%) in Review and four (17%) are Not At Risk.
- For the 20 river waterbodies, eight (40%) are *At Risk*, eight (40%) are in *Review* and four (20%) are *Not At Risk*.
- Of the two lake waterbodies, one is At Risk (Aughrusbeg) and one is in Review (Ard).
- The only coastal waterbody in a 2<sup>nd</sup> Cycle Area for Action (Killary Harbour) is currently in *Review*.
- The largest proportion of At Risk waterbodies are found in river waterbodies, accounting for eight (89%) of the nine At Risk waterbodies. Figure 23 gives an overview of the breakdown of risk across waterbody types for both Cycle 2 and Cycle 3 in 2<sup>nd</sup> Cycle Areas for Action.
- Overall, there is a decrease from 12 to nine At Risk waterbodies in 2<sup>nd</sup> Cycle Areas for Action between Cycle 2 and Cycle 3.

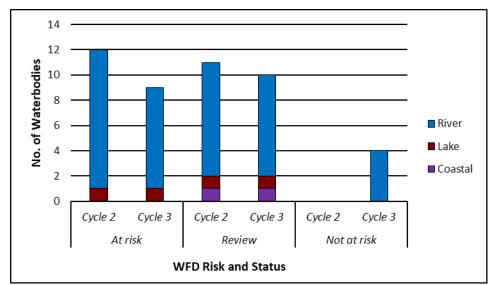


Figure 23: Number of waterbodies in each risk category in 2<sup>nd</sup> Cycle Areas for Action

### 8.4 Significant Issues in 2<sup>nd</sup> Cycle Areas for Action

- Based on the EPA assessment for Cycle 3, the significant issues in the 2<sup>nd</sup> Cycle Areas for Action are nutrient pollution and morphological impacts, impacting eight and seven waterbodies respectively (Figure 24). This is followed by hydrological which is impacting four waterbodies and sediment also impacting three waterbodies.
- The number of 2<sup>nd</sup> Cycle Areas for Action waterbodies associated with each of the significant issues categories has reduced between Cycle 2 and Cycle three except for sediment, other and chemical which have increased slightly.

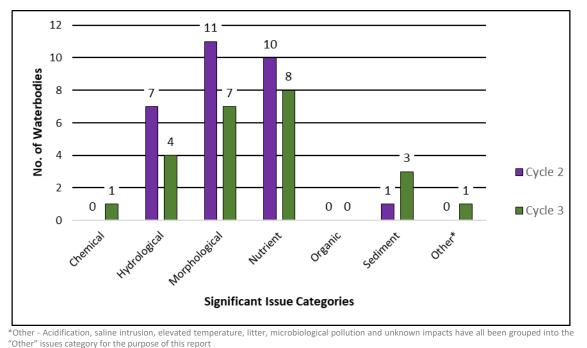
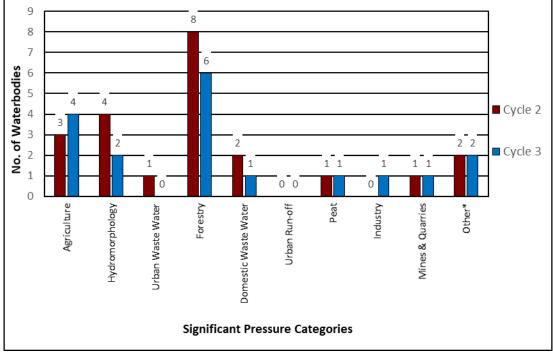


Figure 24: Significant Issues across all 2<sup>nd</sup> Cycle Areas for Action Waterbodies

### 8.5 Significant Pressure in 2<sup>nd</sup> Cycle Areas for Action

- For Cycle 3, in 2<sup>nd</sup> Cycle Areas for Action waterbodies in the catchment the dominant significant pressures are:
  - Forestry six waterbodies are impacted compared to eight impacted in Cycle 2.
  - Agriculture four waterbodies are impacted compared to three impacted in Cycle 2.
  - Hydromorphology two waterbodies are impacted compared to four impacted in Cycle 2.
  - Urban Waste Water Significant Pressures impacted one less waterbody in Cycle 3 than in Cycle 2 and now urban waste water has been removed from the significant pressure list. The Louisburg (D0220) agglomeration was listed as pressures in Cycle 2 but has been removed from the list of significant pressures in Cycle 3.
  - Domestic waste water impacted one less waterbody in Cycle 3 than Cycle 2 and now impacts one waterbody, while industry pressures has increased from no waterbodies to one waterbody in Cycle 3.
  - The remaining significant pressure categories (peat, mines and quarries and other) are impacting the same number of waterbodies in both cycles.
- When comparing the significant pressures in the 2<sup>nd</sup> Cycle Areas for Action between Cycle 2 and 3 there has been a decrease in all significant pressure categories in the catchment with the exception of agriculture and industry pressures which have both increased by one waterbody.



\*Other – abstractions, aquaculture, atmospheric, anthropogenic pressures, historically polluted sites, waste, water treatment and invasive species have all been grouped into the "Other" pressure category for the purpose of this report

Figure 25: Significant Pressures in 2<sup>nd</sup> Cycle Area for Action Waterbodies

### 9 3<sup>rd</sup> Cycle Recommended Areas for Action

### 9.1 Recommended Areas for Action Overview

- For the 3<sup>rd</sup> Cycle Draft River Basin Management Plan Areas for Action have been extended out to not only include Prioritised Areas for Action undertaken by LAWPRO which focussed on restoring waterbodies, but to also include restoration work undertaken by all agencies under Areas for Restoration. In addition, protection work is included under Areas for Protection and research, pilot schemes and community initiatives are included under Catchment Projects. The aim of the 3<sup>rd</sup> Cycle Plan is to capture all activity that is working to restore, improve and/or protect waterbodies.
- The Recommended 3<sup>rd</sup> Cycle Areas for Action list will be included in the Draft River Basin Management Plan and will be finalised after the consultation period.
- There are 17 Areas for Action, comprising of 78 waterbodies, recommended for further characterisation and action in the catchment for the 3<sup>rd</sup> Cycle River Basin Management Plan. 20 of the 78 waterbodies in the 3<sup>rd</sup> Cycle Recommended Areas for Action are *At Risk*, 14 are in *Review* and 44 are *Not At Risk*. The 17 Recommended Areas for Action consist of three Areas for Protection, 12 Areas for Restoration and two Catchment Projects. LAWPRO are the proposed lead organisation in 11 Recommended Areas for Action while the IFI, Mayo County Council and NFGWS are the proposed lead on the two Recommended Areas for Action each. The Recommended Areas for Action in the catchment are listed in Table 6 and shown in Figure 26. The reason for selecting for each waterbody in a Recommended Areas for Action is provided in Appendix 3.

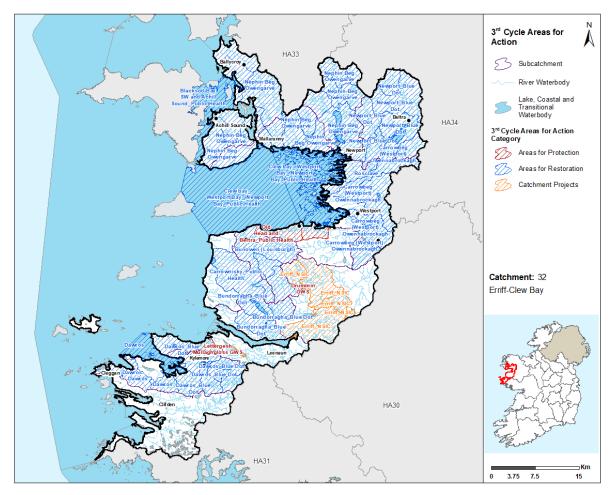


Figure 26: 3<sup>rd</sup> Cycle Recommended Areas for Action Locations

		Recommended		
3rd Cycle		Areas for	Recommended	
Recommended	Number of	Action	Areas for Action	
Areas for Action	Waterbodies	Category	Sub-category	Lead Organisation
Nephin Beg			Prioritised Areas	
Owengarve	19	Restoration	for Action LAWPRO	LAWPRO
			Blue Dot Areas for	
Bundorragha_Blue			Action LAWPRO	
Dot	7	Restoration	and Others	LAWPRO
Bunowen			Prioritised Areas	
(Louisburgh)	4	Restoration	for Action LAWPRO	LAWPRO
			Public Health Areas	
			for Restoration	
Carrownisky_Public			NFGWS, IW, HSE,	Mayo County
Health	2	Restoration	LAs, SFPA	Council
			Blue Dot Areas for	
			Action LAWPRO	
Newport_Blue Dot	8	Restoration	and Others	LAWPRO

		Recommended		
3rd Cycle		Areas for	Recommended	
Recommended	Number of	Action	Areas for Action	
Areas for Action	Waterbodies	Category	Sub-category	Lead Organisation
Carrowbeg				
(Westport)			Prioritised Areas	
Owennabrockagh	7	Restoration	for Action LAWPRO	LAWPRO
			Prioritised Areas	
Dawros	7	Restoration	for Action LAWPRO	LAWPRO
Dawros		Restoration	Public Health Areas	Li Wi No
Old Head and			for Protection	
Bertra_Public			NFGWS, IW, HSE,	Mayo County
Health	2	Protection	LAS, SFPA	Council
	-		Blue Dot Areas for	
			Action LAWPRO	
Dawros_Blue Dot	5	Restoration	and Others	LAWPRO
		Catchment	Public Body	
Erriff NSIC	6	Projects	Research	IFI
	-		Public Health Areas	
			for Protection	
Lettergesh			NFGWS, IW, HSE,	
Mullaghgloss GWS	1	Protection	LAs, SFPA	NFGWS
			Prioritised Areas	
Rosclave	1	Restoration	for Action LAWPRO	LAWPRO
_			Prioritised Areas	
Tully Lake	2	Restoration	for Action LAWPRO	LAWPRO
			Public Health Areas	
			for Protection	
			NFGWS, IW, HSE,	
Drummin GWS	1	Protection	LAs, SFPA	NFGWS
The Artic Char		Catchment	Public Body	
Project	1	Projects	Research	IFI
Clew bay_		-		
Westport Bay_				
Newport			Prioritised Areas	
Bay_Public Health	4	Restoration	for Action LAWPRO	LAWPRO
Blacksod Bay SW				
and Achill				
Sound_Public			Prioritised Areas	
Health	1	Restoration	for Action LAWPRO	LAWPRO

### **10 Catchment Summary**

- Of the 80 river waterbodies, 21 are *At Risk* of not meeting their WFD objectives.
- Six out of 80 lake waterbodies are *At Risk* of not meeting their WFD objectives.
- One out of 22 groundwater bodies is *At Risk*.
- There has been an overall deterioration across the catchment with 28 waterbodies *At Risk* in Cycle 3 compared to 19 waterbodies *At Risk* in Cycle 2.

- The main significant issues are from nutrients pollution followed by morphological impacts, sediment, hydrological impacts, chemical, other <sup>9</sup> and organic pollution.
- The main significant pressures are agricultural and forestry pressures followed by hydrological pressures, other<sup>10</sup>, domestic waste water, peat, industry, mines and quarries and urban run-off.
- The main impacts and pressures driving the change between Cycle 2 and Cycle 3 are increases in waterbodies impacted by nutrient and sediment.
- In the 2<sup>nd</sup> Cycle Areas for Action 12 waterbodies were At Risk in Cycle 2 and nine waterbodies are At Risk in Cycle 3.
- There are 17 3<sup>rd</sup> Cycle Recommended Areas for Action for Cycle 3. They comprise of 78 waterbodies with 20 waterbodies *At Risk*, 14 in *Review* and 44 *Not At Risk*.

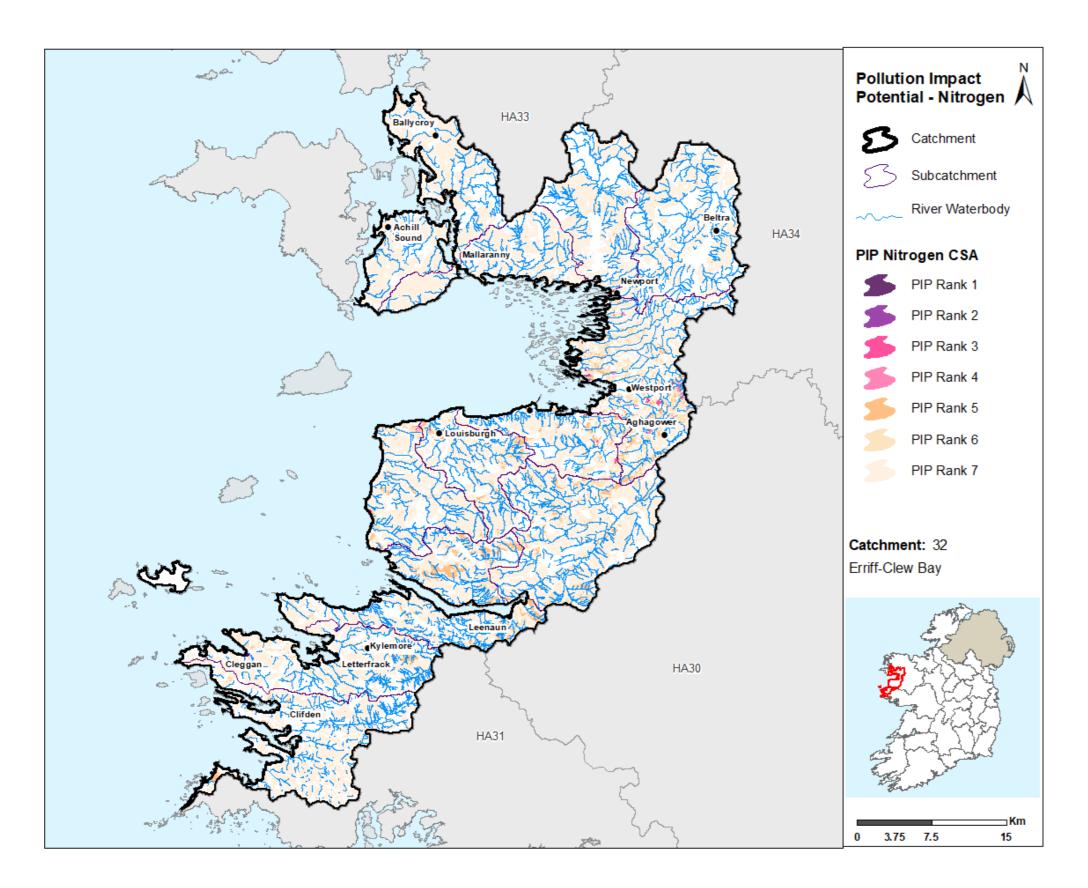
<sup>&</sup>lt;sup>9</sup> Acidification, saline intrusion, elevated temperature, litter, microbiological pollution and unknown impacts have all been grouped into the "Other" issues category for the purpose of this report

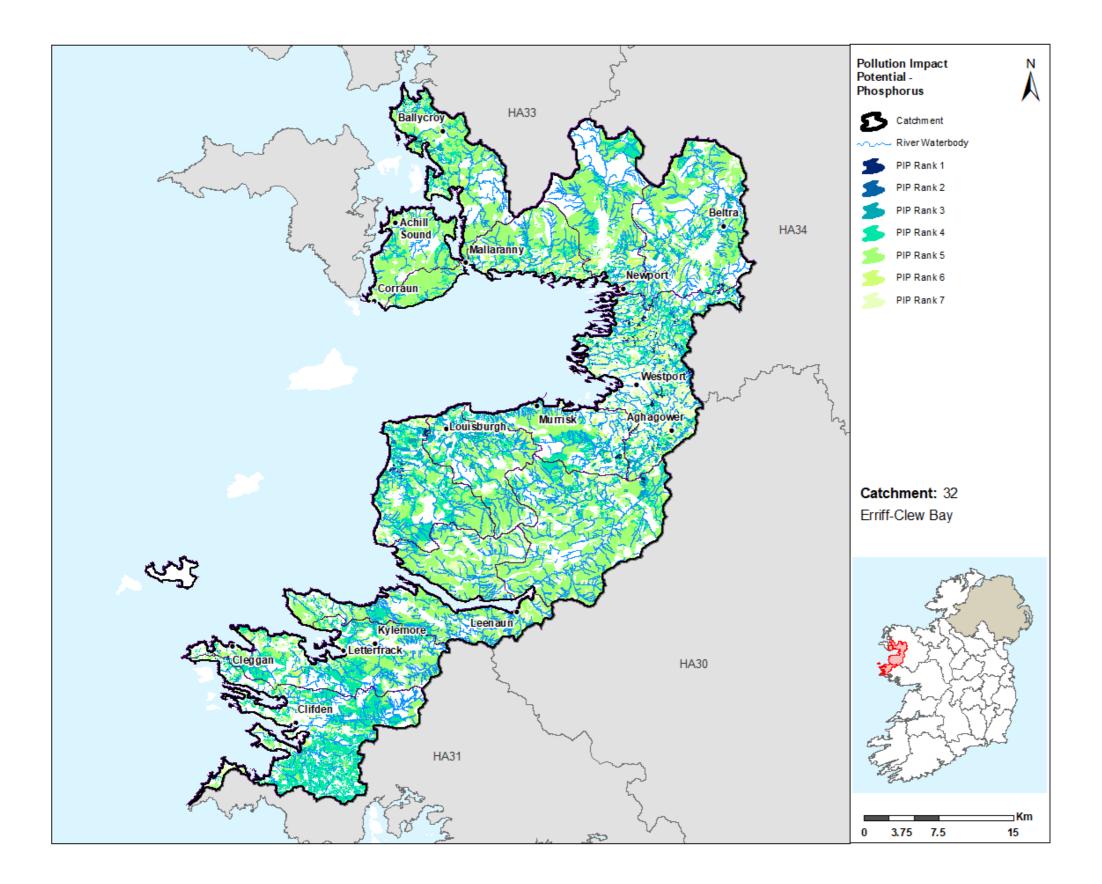
<sup>&</sup>lt;sup>10</sup> Abstractions, aquaculture, atmospheric, anthropogenic pressures, historically polluted sites, waste, water treatment and invasive species have all been grouped into the "Other" pressure category for the purpose of this report

## Appendix 1 High ecological status objective waterbodies

Waterbody Name	Waterbody Type	Waterbody Code	Status 2013-2018
ALTACONEY_010	River	IE_WE_32A020300	High
BUNDORRAGHA_010	River	IE_WE_32B010100	High
BUNDORRAGHA_020	River	IE_WE_32B010200	Good
BUNOWEN (LOUISBURGH)_010	River	IE_WE_32B030050	Good
CARROWBEG (WESTPORT)_010	River	IE_WE_32C050050	Good
CARROWNISKY_010	River	IE_WE_32C010020	High
Clew Bay	Coastal	IE_WE_340_0000	Good
CRUMPAUN_010	River	IE_WE_32C030050	Good
CRUMPAUN_020	River	IE_WE_32C030150	Good
DAWROS_010	River	IE_WE_32D010020	High
DAWROS_020	River	IE_WE_32D010080	Poor
DAWROS_030	River	IE_WE_32D010100	Moderate
DAWROS_040	River	IE_WE_32D010200	Moderate
DERRYEHORRAUN_010	River	IE_WE_32D040200	Good
Enask	Lake	IE_WE_32_333	High
Erriff Estuary	Transitional	IE_WE_310_0100	Good
ERRIFF_010	River	IE_WE_32E010030	High
Fadda	Lake	IE_WE_32_501	High
Glencullin	Lake	IE_WE_32_487	High
GLENISLAND_010	River	IE_WE_32G070300	Poor
GLENLAUR_010	River	IE_WE_32G020200	High
GLENUMMERA_010	River	IE_WE_32G050070	High
Loch an tSaile (Lough Athola), Mannin Bay	Transitional	IE_WE_260_0100	Unassigned
Nambrackkeagh Clifden	Lake	IE_WE_32_422	Unassigned
Nambrackmore Cushatrower	Lake	IE_WE_32_500	Good
NEWPORT (MAYO)_010	River	IE_WE_32N010020	Moderate
NEWPORT (MAYO)_020	River	IE_WE_32N010050	High
NEWPORT (MAYO)_030	River	IE_WE_32N010190	High
Newport Bay	Transitional	IE_WE_350_0200	High
SKERDAGH_010	River	IE_WE_32S010300	Good
STREAMSTOWN (CLIFDEN)_010	River	IE_WE_32S040200	High
TRAHEEN_010	River	IE_WE_32T010100	Good
Tullaghan Bay	Transitional	IE_WE_390_0100	High
Westport Bay	Transitional	IE_WE_350_0100	High

Appendix 2 Pollution Impact Potential Mapping





## Appendix 3 Summary information on all waterbodies in the Errif-Clew Bay Catchment

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recommended Areas for Action Name	Recommended Areas for Action (reasons for selection)
22.2			River	Not at rick	Net et rick	Llich	Llich	Yes		Nephin Beg	Include to keep SC complete for characterisation.
32_3 32_8	IE_WE_32A020300 IE WE 32A120170	ALTACONEY_010 AGHANY 010	River	Not at risk Review	Not at risk Review	High	High Unassigned	No		Owengarve	
	IE_WE_32A120170	AGHANT_010		Keview	Review	Unassigned	Unassigned	NO		Bundorragha_Blue	Existing PAA water body but confirmed as not impacted. Keep because of subcatchment approach and to continue to work with PMP EIP
32_9	IE_WE_32B010100	BUNDORRAGHA_010	River	Review	Not at risk	Unassigned	High	Yes		Dot	& look at transition arrangements post EIP.
32_9	IE_WE_32B010200	BUNDORRAGHA_020	River	At risk	At risk	Good	Good	Yes	Hymo, Ind, Other	Bundorragha_Blue Dot	Existing PAA water body confirmed as impacted by hymo but extent of pressures & actions not adequately understood in oligotrophic/FPM catchments. Continue to work with PMP EIP & look at transition arrangements.
32_2	IE_WE_32B020100	BUNNAHOWNA_010	River	Not at risk	Not at risk	Good	Good	No		Nephin Beg Owengarve	Not hydrologically linked to any other WB in this SC. Included for now, but could be dropped. Not selected by anyone.
32_1	IE_WE_32B030050	BUNOWEN (LOUISBURGH)_010	River	Not at risk	Review	High	Good	Yes		Bunowen (Louisburgh)	Deteriorated blue dot. Expand Bunowen PAA upstream.
32_1	IE_WE_32B030100	BUNOWEN (LOUISBURGH)_020	River	Not at risk	Not at risk		Good	No		Bunowen (Louisburgh)	Include for completeness for Bunowen PAA characterisation.
32_1	IE_WE_32B030150	BUNOWEN (LOUISBURGH)_030	River	At risk	At risk	Moderate	Moderate	No	Ag, DWW, Peat	Bunowen (Louisburgh)	Existing at risk PAA water body. Complex issues with tidally influenced pressures potentially.
32_11	IE_WE_32B040100	BUNOWEN (KILLARY HARBOUR)_010	River	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_11	IE_WE_32B040100	BALLINABOY 020	River	At risk	At risk	Poor	Poor	No	Other		
32_12	IE_WE_32B070300	BALLINABOY_020	River	Review	Review	Unassigned	Unassigned	No	Other		
32_12	IE_WE_32B070330	Ballynakill lough stream_010	River	Not at risk	Not at risk		Unassigned	No			
32_12	IE_WE_32B090960	BALLINABOY_010	River	Review	Review	Unassigned	Unassigned	No			
32_12	IE_WE_32B240990	BOOLAGARE_010	River	Review	Review	Unassigned	Unassigned	No			

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recommended Areas for Action Name	Recommended Areas for Action (reasons for selection)
32_8	IE WE 32C010020	CARROWNISKY 010	River	Not at risk	Not at risk	High	High	Yes		Carrownisky_Public Health	Public health areas for restoration / Protection Cross Beach Louisburgh and Carrowniskey. If this WB is included in a new AFA, then also include u/s Carrownisky_010. For discussion with MCC.
32_8	IE_WE_32C010020	CARROWNISKY_010	River	Not at risk	At risk	Good	Moderate	No	Ag, DWW	Carrownisky_Public Health	Public health areas for restoration / Protection Cross Beach Louisburgh and Carrowniskey. If this WB is included in a new AFA, then also include u/s Carrownisky_010.
32_8	IE_WE_32C010250	CROSS (MAYO)_010	River	Not at risk	Not at risk		Good	No	Ag, DVVVV	Fieditii	
52_10											
32_5	IE_WE_32C030050	CRUMPAUN_010	River	Not at risk	Not at risk	Good	Good	No		Newport_Blue Dot	Expand PAA. PA obj not met.
32_5	IE_WE_32C030150	CRUMPAUN_020	River	Not at risk	At risk	High	Good	Yes	For	Newport_Blue Dot	Expand PAA. AR HSO WB. Glendorragha Lough (not WFD). The NFGWS would like to propose that the Glendorragha River catchment is included within a PAA on the basis of Public Health. The river is used for water abstraction by Glenhest GWS. The lake is currently classified as being of 'Good' status and worthy of Protection. In addition, the Glendorragha River flows into the Newport River SAC. Glenhest GWS
32_11	IE WE 32C040040	CULFIN 010	River	At risk	At risk	Moderate	Poor	No	Hymo, Other		
32_11	IE_WE_32C040040	CULFIN_020	River	Not at risk	Not at risk			No	Other		
32_6	IE_WE_32C050050	CARROWBEG (WESTPORT)_010	River	Not at risk	At risk	High	Good	Yes	Hymo	Carrowbeg (Westport) Owennabrockagh	At risk HSO WB. MCC proposed.
32_6	IE_WE_32C050100	CARROWBEG (WESTPORT)_020	River	Not at risk	Not at risk	Unassigned	Unassigned	No		Carrowbeg (Westport) Owennabrockagh	Add to complete Carrowbeg (Westport) river

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recommended Areas for Action Name	Recommended Areas for Action (reasons for selection)
										Carrowbeg	
		CARROWBEG								(Westport)	
32_6	IE_WE_32C050300	(WESTPORT)_030	River	At risk	At risk	Moderate	Moderate	No	M+Q, UR	Owennabrockagh	At risk RWB and upper WB included.
32_13	IE WE 32C150990	CLOONEDEROWEN 010	River	Review	Review	Unassigned	Unassigned	No		Dawros	Unassigned WB LAWPRO has confirmed is impacted. Requires unassigned RWB plan for 3rd cycle.
32_6	IE WE 32C160630	CLOGHAN 010	River	Review	Review	Unassigned	Unassigned	No		Dumos	
		-									Unassigned WB LAWPRO has confirmed is impacted. Requires unassigned RWB plan for
32_13 32_6	IE_WE_32C370900 IE_WE_32C380790	CLOON_010 CLOONKEEN 010	River River	Review Review	Review Review	Unassigned	Unassigned	No No		Dawros	3rd cycle.
						Unassigned	Unassigned			Old Head and Bertra_Public	MCC: Public health areas for restoration / Protection Old Head and Bertra Identified
32_7	IE_WE_32C490920	CARROWKEERAN_010	River	Review	Review	Unassigned	Unassigned	No		Health	bathing areas.
32_13	IE_WE_32D010020	DAWROS_010	River	At risk	Not at risk	Good	High	Yes		Dawros_Blue Dot	Has improved, but keep as as full Dawros subcatchment is included for 3rd cycle. PMP EIP.
32_13	IE_WE_32D010080	DAWROS_020	River	Not at risk	At risk	High	Poor	Yes	Ind	Dawros_Blue Dot	Newly deteriorated. Proposed by GCC also. Moving d/s in Dawros river subcatchment. Important for FPM. Some understanding of the issues already available. PMP EIP. PAA needs to include the unassigned lake - Lough Maladrolaun d/s of Kylemore Abbey.
32_13	IE_WE_32D010100	DAWROS_030	River	Not at risk	At risk	High	Moderate	Yes	Ind	Dawros_Blue Dot	Newly deteriorated. Proposed by GCC also. Moving d/s in Dawros river subcatchment. Important for FPM. Some understanding of the issues already available. PMP EIP.
32_13	IE_WE_32D010200	DAWROS_040	River	Not at risk	At risk	High	Moderate	Yes	Peat	Dawros_Blue Dot	Newly deteriorated. Proposed by GCC also. Moving d/s in Dawros river subcatchment. Important for FPM. Some understanding of the issues already available. PMP EIP.
32_10	IE_WE_32D020150	DERRYCRAFF_010	River	Not at risk	Not at risk	Good	Good	No	DIA		
32_12	IE_WE_32D040200	DERRYEHORRAUN_010	River	At risk	At risk	Good	Good	Yes	DWW, Peat		
32_3	IE_WE_32D200860	DERRYHILLAGH_010	River	Review	Review	Unassigned	Unassigned	No		Nephin Beg Owengarve	Existing PAA WB. LCA hasn't started yet. Keep.
32_10	IE_WE_32E010030	ERRIFF_010	River	Not at risk	Not at risk	High	High	Yes		Erriff_NSIC	IFI proposed.
32_10	IE_WE_32E010100	ERRIFF_020	River	Not at risk	Not at risk	Good	High	No		Erriff_NSIC	IFI & NPWS proposed.

Subcatchment Code	t Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recommended Areas for Action Name	Recommended Areas for Action (reasons for selection)
32_10	IE_WE_32E010200	ERRIFF_030	River	Not at risk	Not at risk	Good	High	No		Erriff_NSIC	IFI & NPWS proposed.
32_10	IE_WE_32E010300	ERRIFF_040	River	Not at risk	Not at risk	Good	Good	No		Erriff_NSIC	IFI & NPWS proposed.
32_10	IE_WE_32G020200	GLENLAUR_010	River	Not at risk	Not at risk	High	High	Yes			
32_3	IE_WE_32G030100	GLENAMONG_010	River	At risk	At risk	Moderate	Moderate	No	Ag, For	Nephin Beg Owengarve	Existing PAA WB. LCA hasn't started yet. Keep.
32_9	IE_WE_32G050070	GLENUMMERA_010	River	Not at risk	Not at risk	High	High	Yes		Bundorragha_Blue Dot	Not at risk. Include for completeness for subcatchment approach.
32_3	IE_WE_32G060100	GOULAUN_010	River	Not at risk	Not at risk	Good	Good	No		Nephin Beg Owengarve	Include to keep SC complete for characterisation.
32_5	IE_WE_32G070300	GLENISLAND_010	River	At risk	At risk	Good	Poor	Yes	Ag, For	Newport_Blue Dot	Existing AR PAA WB. LCA just started. HSO.
32_4	IE_WE_32G090920	GLENNANEAN_010	River	Not at risk	Not at risk	Unassigned	Unassigned	No		Nephin Beg Owengarve	Could include if resources available, as BIM have proposed Blacksod Bay SW / Achill Sound.
32_12	IE_WE_32G260730	GRALLAGH_010	River	Review	Review	Unassigned	Unassigned	No			
32_8	IE_WE_32K150330	KILLADOON_010	River	Review	Review	Unassigned	Unassigned	No			
32_11	IE_WE_32L080780	LETTERBRICKAUN_010	River	Review	Review	Unassigned	Unassigned	No			
32_9	IE_WE_32L120720	LACKAKEELY_010	River	Review	Review	Unassigned	Unassigned	No			
32_12	IE_WE_32L160920	LETTERNOOSH_010	River	Review	Review	Unassigned	Unassigned	No			/
32_7	IE_WE_32L480810	LECKANVY_010	River	Review	Review	Unassigned	Unassigned	No		Old Head and Bertra_Public Health	MCC: Public health areas for restoration / Protection Old Head and Bertra Identified bathing areas.
32_6	IE_WE_32M010700	MOYOUR_010	River	Not at risk	Not at risk		Good	No		Carrowbeg (Westport) Owennabrockagh	
32_11	IE_WE_32M080920	MULLAGHGLASS_010	River	Review	Review	Unassigned	Unassigned	No		Lettergesh Mullaghgloss GWS	The NFGWS would like to propose that the Mullaghglas Stream catchment is included within a PAA on the basis of Public Health. The lake is used for water abstraction by Lettergesh GWS. The lake is not currently assigned a WFD classification. Lettergesh Mullaghgloss GWS. Also proposed by NPWS.
32_2	IE_WE_32M110390	MURREVAGH_010	River	Review	Review	Unassigned	Unassigned	No		Nephin Beg Owengarve	Existing PAA WB. LCA hasn't started yet. Keep.
32_5	IE_WE_32N010020	NEWPORT (MAYO)_010	River	At risk	At risk	Moderate	Moderate	No	For, M+Q	Newport_Blue Dot	Existing AR PAA WB. LCA just started.
32_5	IE_WE_32N010050	NEWPORT (MAYO)_020	River	Not at risk	Not at risk	High	High	Yes		Newport_Blue Dot	Include to complete SC.

Subcatchment Code	: Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recommended Areas for Action Name	Recommended Areas for Action (reasons for selection)
32_5	IE_WE_32N010190	NEWPORT (MAYO)_030	River	Not at risk	Not at risk	High	High	No		Newport Blue Dot	Expand PAA. Protected Area WB not achieving Objective. Newport WTP /EPA Pesticide Act and Watch list
32_2	IE_WE_320020100	OWENGARVE (MAYO)_010	River	At risk	At risk	Poor	Poor	No	For, Hymo	Nephin Beg Owengarve	Existing PAA WB. LCA hasn't started yet. Keep.
32_2	IE_WE_320020200	OWENGARVE (MAYO)_020	River	Not at risk	At risk	Good	Moderate	No	Ag, Hymo	Nephin Beg Owengarve	Expand PAA & include this AR WB.
32_12	IE_WE_320030100	OWENGLIN_010	River	Not at risk	Not at risk	High	High	No			
32_12	IE_WE_320030200	OWENGLIN_020	River	Not at risk	Not at risk	Good	High	No			
32_12	IE_WE_320030300	OWENGLIN_030	River	Not at risk	Not at risk	Good	Good	No			
32_6	IE_WE_320040500	-		Not at risk	At risk	Good	Moderate	No	For, Hymo	Carrowbeg (Westport) Owennabrockagh	Deteriorated good status WB. Blue Dot Site failing. MCC proposed.
32_7	IE_WE_320060200	, , <b>,</b>	River	Not at risk	Not at risk	High	Good	No			
32_7	IE_WE_320060600	OWENWEE (MAYO)_020	River	Not at risk	Not at risk	Good	Good	No			
32_8	IE_WE_320070100	OWENNADORNAUN_010	River	At risk	Not at risk	Moderate	Good	No			
32_10	IE_WE_320080100	OWENDUFF (ERRIFF)_010	River	Not at risk	Not at risk	Good	Good	No			
32_6	IE_WE_32R050700	ROSCLAVE_010	River	Review	Review	Unassigned	Unassigned	No		Rosclave	
32_2	IE_WE_32R160730	ROCKFLEET_010	River	Review	Review	Unassigned	Unassigned	No		Nephin Beg Owengarve	Existing PAA WB. LCA hasn't started yet. Keep.
32_5	IE_WE_32S010300	SKERDAGH_010	River	At risk	At risk	Good	Good	Yes	For	Newport_Blue Dot	Existing AR PAA WB. LCA just started. HSO.
	, ,	,	1							Nephin Beg	
32_3	IE_WE_32S020100	SRAHMORE_010	River	At risk	Not at risk	Poor	Good	No		Owengarve	Existing PAA WB. LCA hasn't started yet. Keep.
	, ,	STREAMSTOWN									
32_12	IE_WE_32S040200	(CLIFDEN)_010	River	Not at risk	Not at risk	High	High	Yes			
32_13	IE_WE_32T010100	TRAHEEN_010	River	At risk	Not at risk	Good	Good	Yes		Dawros_Blue Dot	This water body is not achieving its high status objective. LAWPRO is working on the action plan and requires more time here. WB is impacted in several streams.
32_11	IE_WE_32T180580	TULLYMORE (Galway)_010	River	Not at risk	Not at risk	Unassigned	Unassigned	No		Tully Lake	This water body contains Tully lake which has been proposed, therefore we need the inputting water body to be able to work effectively here.
32_4	IE_WE_32T460890	TALLAGH_010	River	Review	Review	Unassigned	Unassigned	No		Nephin Beg Owengarve	Existing PAA WB. LCA hasn't started yet. Keep.
32_4	IE_WE_33B040300	BELLAGARVAUN_010	River	At risk	At risk	Moderate	Moderate	No	Ag, For	Nephin Beg Owengarve	Existing PAA WB. LCA hasn't started yet. Keep.
32_4	IE_WE_33B090100	BUNANIOO_010	River	Not at risk	Not at risk	Good	Good	No		Nephin Beg Owengarve	Could include if resources available, as BIM have proposed Blacksod Bay SW / Achill Sound.

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recomme Areas for Name
32_4	IE_WE_33C020100	CARTRON_010	River	Not at risk	At risk	Good	Moderate	No	For, Hymo	Nephin Be Owengary
32_4	IE_WE_33C610950	CREGGAN_010	River	Review	Review	Unassigned	Unassigned	No		Nephin Be Owengary
32_12	IE WE 31 180	Nambrackkeagh Ballyconneely	Lake	Review	Review	Unassigned	Unassigned	No		
32_12	IE WE 31 206	Nacorrossaunbeg	Lake	Review	Review	Unassigned	Unassigned	No		
32_12	IE_WE_32_269	Barnahallia	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_295	Ballybwee	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
										Bunowen
32_1	IE_WE_32_306	Lugaloughan	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		(Louisburg
32_12	IE_WE_32_315	Doola More	Lake	Not at risk	Review	Unassigned	Unassigned	No		
32_11	IE_WE_32_320	Acreragh	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_13	IE_WE_32_329	Touther	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		Dawros_B
32_12	IE_WE_32_333	Enask	Lake	Not at risk	Not at risk	High	High	Yes		
32_12	IE_WE_32_342	Kerryhill	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_346	Derrywaking	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_347	Ballyagroun	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_10	IE_WE_32_349	Derrintin	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_351	Shaungagh	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_356	Boolagare	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_9	IE_WE_32_358	Cunnel	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		Bundorrag Dot
32_12	IE_WE_32_359	Ballybawn	Lake	Review	Review	Unassigned	Unassigned	No		L
										Carrowbe
										(Westport
32_6	IE_WE_32_364	Ballin MO	Lake	Not at risk	At risk	Good	Moderate	No	Ag	Owennab
32_12	IE_WE_32_368	Awaddy	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		L
32_12	IE_WE_32_377	Cam Cushatower	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		L
32_12	IE_WE_32_388	Allinour	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		

nended r Action	Recommended Areas for Action (reasons for selection)
Beg rve	Not hydrologicall linked to existing PAA WBs. Could exclude, however included for now as AR.
Beg rve	Existing PAA WB. LCA hasn't started yet. Keep.
n rgh)	Sits within deteriorated Bunowen (Louisburgh)_010 WB. Unassigned lake.
Blue Dot	Part of Dawros_040 WB. Include to comeplet SC.
agha_Blue	Proposed by NPWS only. IE0001932 - Mweelrea/Sheeffry/Erriff Complex SAC Coastal lagoons. Najas flexilis. Margaritifera margaritifera
eg rt) brockagh	The NFGWS would like to propose that the Ballin Lough catchment is included within a PAA on the basis of Public Health. The lake is used for water abstraction by Kilmeena GWS. The lake is currently classified as being of 'Moderate' status and worthy of restoration. Kilmeena GWS

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recomme Areas for Name
32_12	IE_WE_32_390	Agh	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_9	IE_WE_32_391	Fin MO	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		Bundorra Dot
32_10	IE_WE_32_392	Glenawough	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		Erriff_NSI
32_12	IE_WE_32_401	Munga	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_402	Beaghcauneen	Lake	Not at risk	At risk	Good	Moderate	No	Other	
32_12	IE_WE_32_405	Nasoodery	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_7	IE_WE_32_406	Moher	Lake	Review	Not at risk	Good	Good	No		
32_12	IE_WE_32_410	Nagraiguebeg	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_415	Island GY	Lake	Review	Review	Unassigned	Unassigned	No		
32_12	IE_WE_32_420	Avougheen	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_422	Nambrackkeagh Clifden	Lake	Review	Review	Unassigned	Unassigned	Yes		
32_10	IE_WE_32_428	Lugacolliee	Lake	Not at risk	Not at risk	Unassigned	Unassigned	Νο		Drummin
										Nephin Be
32_3	IE_WE_32_432	Ard	Lake	Review	Review	Unassigned	Unassigned	No		Owengarv
32_11	IE_WE_32_434	Rusheenduff	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		L
32_13	IE_WE_32_436	Aughrusbeg	Lake	At risk	At risk	Bad	Poor	No	Other	
32_12	IE_WE_32_437	Tullalumman More	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_10	IE_WE_32_441	Tawnyard	Lake	Review	Review	Unassigned	Unassigned	No		L
32_12	IE_WE_32_442	Ballywalter	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_448	Naweelaun	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_449	Emlaghmore	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		

nended r Action	Recommended Areas for Action (reasons for selection)
agha_Blue	Proposed by NPWS. IE0001932 - Mweelrea/Sheeffry/Erriff Complex SAC Coastal lagoons. Najas flexilis. Margaritifera margaritifera
SIC	Important Arctic char lake, important indicator species and for biodiversity. Proposed by IFI & NPWS.
n GWS	The NFGWS would like to propose that the Lugacolliee Lough catchment is included within a PAA on the basis of Public Health. The lake is used for water abstraction by Drummin GWS. The lake is currently unclassified, while the downstream waterbodies (Erriff_010 - Erriff_040) is classified as being of 'High' to 'Good' status and worthy of protection. In addition, the lake is located within the Mweelrea/Sheeffry/Erriff Complex SAC Drummin GWS
Beg rve	Existing PAA WB. LCA has commenced. Keep.

Subcatchment			Waterbody					High Ecological Status Objective	Significant	Recommended Areas for Action	Recommended Areas for Action
Code	Waterbody Code	Waterbody Name	Туре	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	Waterbody	Pressures	Name	(reasons for selection)
										Carrowbeg (Westport)	The NFGWS would like to propose that the Clogher Lough catchment is included within a PAA on the basis of Public Health. The lake is used for water abstraction by Fahy GWS. The lake is currently unclassified, while the downstream waterbodies (Mayour_010) is classified as being of 'Good' status and worthy of protection.
32_6	IE_WE_32_450	Clogher MO	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		Owennabrockagh	Fahy GWS
32_5	IE_WE_32_452	Beltra	Lake	Not at risk	Not at risk	Good	Good	No		Newport_Blue Dot	Include to ensure complete SC is included in desktop characterisation, but focus will be on inputting rivers.
32_12	IE_WE_32_454	Cloonagat	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_11	IE_WE_32_458	Nacarrigeen	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_12	IE_WE_32_459	Derrycunlaghbeg	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_6	IE_WE_32_463	Doo Westport	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_12	IE_WE_32_465	Loughaunarow	Lake	Review	Review	Unassigned	Unassigned	No			
32_12	IE_WE_32_467	Derrycunlagh More	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_12	IE_WE_32_469	Nacorrussaun	Lake	Review	Review	Unassigned	Unassigned	No			
32_8	IE_WE_32_472	Nahaltora	Lake	Review	Review	Unassigned	Unassigned	No			
											Decline in lake water quality shown in EPA data (fluctuating between good and moderate) and there is also an MCPA issue that needs to be investigated. LA wish LAWPRO to lead. Agriculture and DWWTS identified for focus. The NFGWS would like to propose that the Tully Lough catchment is included within a PAA on the basis of Public Health. The lake is used for water abstraction by Cloonluane GWS. The lake is currently classified as being of 'Moderate' status and worthy of restoration. In addition, Tully Lough is a designated as an SAC.
32_11	IE_WE_32_474	Tully Nacadany Fast	Lake	Not at risk	At risk	Good	Moderate	No	Ag	Tully Lake	Cloonluane GWS
32_12	IE_WE_32_475	Nasoodery East	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No No			
32_12	IE_WE_32_477	Croaghat	Lake	Review	Review	Unassigned	Unassigned				
32_12	IE_WE_32_478	Doonan	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_13	IE_WE_32_479	Ballynakill	Lake	Not at risk	Not at risk	Good	Good	No			

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recomme Areas for Name
32 12	IE WE 32 481	Shannalecka	Lake	Review	Review	Unassigned	Unassigned	No		
32 11	IE WE 32 482	Muck GY	Lake	Review	Review	Unassigned	Unassigned	No		
32_6	IE_WE_32_483	Knappaghbeg	Lake	At risk	At risk	Moderate	Moderate	No	Ag	
32_12	IE_WE_32_486	Usk	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_9	IE_WE_32_487	Glencullin	Lake	Not at risk	Not at risk	High	High	Yes		Bundorrag Dot
32_9	IE_WE_32_490	Doo MO	Lake	Not at risk	Not at risk	Good	Good	No		Bundorrag Dot
32_12	IE_WE_32_491	Scannive	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_496	Conga	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_497	Derrylea	Lake	Review	Review	Unassigned	Unassigned	No		
										The Arctic
32_11	IE_WE_32_498	Fee	Lake	Review	Review	Unassigned	Unassigned	No		Project
32_13	IE_WE_32_499	Courhoor	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		Dawros
		Nambrackmore								
32_12	IE_WE_32_500	Cushatrower	Lake	Not at risk	At risk	High	Good	Yes	Other	_
32_12	IE_WE_32_501	Fadda	Lake	Not at risk	Not at risk	High	High	Yes		-
32_12	IE_WE_32_502	White GY	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_503	Nahillion Clifden	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_504	Nambrackderg More	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
32_12	IE_WE_32_505	Sruffaunavougheen	Lake	Not at risk	Review	Unassigned	Unassigned	No		_
32_12	IE_WE_32_507	Fadda West	Lake	Review	Review	Unassigned	Unassigned	No		
32_12	IE_WE_32_508	Nasodery West	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		
22.12		Dellasaraul	Laka		Net et rist	Cood	Cood	No		
32_13	IE_WE_32_509a	Pollacappul	Lake	Not at risk	Not at risk	Good	Good	No		Dawr

nended r Action	Recommended Areas for Action (reasons for selection)
agha_Blue	Proposed by NPWS. IE0001932 - Mweelrea/Sheeffry/Erriff Complex SAC Coastal lagoons. Najas flexilis. Margaritifera margaritifera
agha_Blue	Proposed by NPWS. IE0001932 - Mweelrea/Sheeffry/Erriff Complex SAC Coastal lagoons. Najas flexilis. Margaritifera margaritifera. Also proposed by IFI as important arctic char lake. Important within SC of Bundorragha River.
	important within SC of Bundonagna River.
ic Char	Proposed by NPWS. Artic Char lake.
_Blue Dot	Include based on subcatchment approach to ensure this lake is accounted for in the deskstudy for this expanded PAA.

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recommended Areas for Action Name	R (1
											t
											g
											r F
											c
											Ν
32_13	IE_WE_32_509b	Kylemore	Lake	Not at risk	Not at risk	Good	Good	No		Dawros_Blue Dot	F
		<b>F</b> h		All and the state	No. of the	Caral	Card			Nephin Beg	
32_3	IE_WE_32_510	Feeagh	Lake	Not at risk	Not at risk	Good	Good	No		Owengarve	C
32_13	IE_WE_32_526	Fawna	Lake	Not at risk	Review	Unassigned	Unassigned	No			+
32_4	IE WE 33 1790	Anaffrin	Lake	Not at risk	Not at risk	Unassigned	Unassigned	No		Nephin Beg Owengarve	E
28_2, 29_3,			Lake	NOUALTISK	NOU dUTISK	onassigned	onassigned			Owengalve	+
31_1, 31_3,											
31_4, 31_5,											
31_6, 31_8,		Aran Islands, Galway Bay,									
31_9, 32_12	IE_WE_010_0000	Connemara (HAs 29;31)	Coastal	Not at risk	Review	Unassigned	Unassigned	No			_
31_4, 32_11,											
32_12, 32_13,											
32_4, 32_8, 32_9, 33_10,											
33_2, 33_5,											
33_7, 33_8,											
33_9, 34_11,		Western Atlantic									
34_13, 35_12	IE_WE_250_0000	Seaboard (HAs 32;33;34)	Coastal	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_12	IE_WE_260_0000	Mannin Bay	Coastal	Not at risk	Not at risk	Unassigned	Unassigned	No			_
											5
											E
		Dellunebill Devi	Canatal	Neterial	Neterial	Lineactory	Lineactory			Devuree	S
32_11, 32_13	IE_WE_300_0000	Ballynakill Bay	Coastal	Not at risk	Not at risk	Unassigned	Unassigned	No		Dawros	F
32_10, 32_11,				1	1						

Recommended	
Areas for Action	Recommended Areas for Action
Name	(reasons for selection)
Dawros_Blue Dot	LAWPRO have proposed the inputting water body which will give us a good understanding of the inputs to this lake. The lake is achieving it's good status objective, but it is important to protect it because of Artic Char and its conservation interests as pointed out by IFI & NPWS. Important Arctic char lake. SAC for FPM. PMP EIP
Nephin Beg	Include to keep SC complete for
Owengarve	characterisation.
Nephin Beg Owengarve	Included unassigned lake as part of Bellagarvaun_010 WB which is AR.
Dawros	Shellfish Production area IEPA2_0028. Current Bivalve Mollusc Classifcaiton for this produciton site is a Seasonal 'A' for mussels. Protect & restore

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Rick 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recommended Areas for Action Name	Recommended Areas for Action (reasons for selection)
			Type	MiSK 10 15	115K 15 10	5101015	510105 15 10	Waterbouy	Tressures		
32_1, 32_2, 32_4, 32_7, 32_8	IE_WE_340_0000	Clew Bay	Coastal	Review	Not at risk	Good	Good	Yes		Clew bay_ Westport Bay_ Newport Bay_Public Health	Proposed by BIM. Shellfish Protected area IEPA2_0006. Concern over spikes in E.coli levels in shellfish testing on a number of occasions in some of the production areas within Clew Bay. There are 7 production areas within Clew Bay for oysters and mussels . Protect & restore
32_2, 32_6, 32_7	IE_WE_350_0000	Inner Clew Bay	Coastal	Not at risk	Not at risk	Good	High	No		Clew bay_ Westport Bay_ Newport Bay_Public Health	Proposed by BIM. Shellfish Protected area IEPA2_0006. Concern over spikes in E.coli levels in shellfish testing on a number of occasions in some of the production areas within Clew Bay. There are 7 production areas within Clew Bay for oysters and mussels . Protect & restore. Contributing PAAs are: Nephin Beg / Owengarve.
32_4, 33_11, 33_2, 33_5,											
33_7	IE_WE_360_0000	Blacksod Bay	Coastal	Not at risk	Not at risk	Unassigned	Unassigned	No			
32_4, 33_7	IE_WE_370_0000	Blacksod Bay SW / Achill Sound	Coastal	Not at risk		Unassigned	Unassigned	Νο		Blacksod Bay SW and Achill Sound_Public Health	Proposed by BIM. Shellfish Protected area IEPA2_0030. Concern over the changes in recent years to Bivalve Classification Production Area for oysters - Production area 'Dorriel Creek' from Classificaiton 'A' to Seasonal 'A'. Protect & restore.Shellfish Protected area IEPA2_0029. Corcern over the proposed change 2020-2021 to Bivalve Classification Produciton Area for oysters - Production area ' Corraun' from Classificaton 'A' to Seasonal 'A'. Protect & restore.
32_4	IE_WE_380_0000	Bellacragher Bay	Coastal	Not at risk	Review	Unassigned	Unassigned	No			
32_12	IE_WE_260_0100	Loch an tSaile (Lough Athola), Mannin Bay	Transitional	Review	Review	High	Unassigned	Yes			
32_12	IE_WE_270_0100	Clifden Bay	Transitional	Review	Not at risk	Unassigned	Unassigned	No			
32_13	IE_WE_280_0100	Lough BÃ <sup>3</sup> Finne, Inishbofin	Transitional	Review	Review	Unassigned	Unassigned	No			

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recomme Areas for Name
22 12		Lough Anillaun, Cleggan	Transitional	Not at rick	Deview	Unassigned	Linessigned	No		
32_13	IE_WE_290_0100	Bay	Transitional	Not at risk	Review	Unassigned	Unassigned	No		
32_10, 32_11	IE_WE_310_0100	Erriff Estuary	Transitional	Not at risk	Not at risk	High	Good	Yes		Erriff_NSI
32_8	IE_WE_320_0100	Corragaun Lough	Transitional	Not at risk	Review	Unassigned	Unassigned	No		
32_8	IE_WE_330_0100	Roonagh Lough	Transitional	Not at risk	Review	Unassigned	Unassigned	No		
32_6, 32_7	IE_WE_350_0100	Westport Bay	Transitional	Not at risk	Not at risk	High	High	Yes		Clew bay_ Westport Newport Bay_Public
32_2, 32_3,										Clew bay_ Westport Newport
32_5, 32_6	IE_WE_350_0200	Newport Bay	Transitional	Not at risk	Not at risk	High	High	Yes		Bay_Publi
32_3	IE_WE_350_0300	Furnace Lough	Transitional	Not at risk	Not at risk	Good	High	No		
32_4, 33_11, 33_6	IE_WE_390_0100	Tullaghan Bay	Transitional	Not at risk	Not at risk	High	High	Yes		
30_14, 30_18, 31_1, 31_2, 31_3, 31_4, 31_5, 31_6, 31_7, 31_8,										
32_12	IE_WE_G_0004	Spiddal	Groundwater	Review	Not at risk	Good	Good	No		

nended r Action	Recommended Areas for Action (reasons for selection)
SIC	Proposed by BIM. Shellfish Production area IEPA2_0011. Killary has a 'B' classification for Bivalve Mollusc Production. Protect & restore. Also proposed by IFI & NPWS. Contributing PAA: Bundorragha (full SC); Tully Lake (New PAA, partial SC); None of Erriff SC included in a LAWPRO PAA.
/_ t Bay_ t lic Health	Proposed by BIM. Shellfish Protected area IEPA2_0006. Concern over spikes in E.coli levels in shellfish testing on a number of occasions in some of the production areas within Clew Bay. There are 7 production areas within Clew Bay for oysters and mussels . Protect & restore. Contributing PAAs are: None.
/_ t Bay_ t lic Health	Proposed by BIM. Shellfish Protected area IEPA2_0006. Concern over spikes in E.coli levels in shellfish testing on a number of occasions in some of the production areas within Clew Bay. There are 7 production areas within Clew Bay for oysters and mussels . Protect & restore. Contributing PAA: Nephin Beg / Owengarve; Newport

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recomme Areas for Name
29_6, 30_14,										
30_15, 30_16,										
30_17, 30_18,										
30_7, 31_2,										
31_3, 31_6,										
31_7, 31_8,		Maam-Clonbur	Croundwator	Not at risk	Not at rick	Cood	Cood	No		
32_10, 32_11 30_15, 31_2,	IE_WE_G_0006		Groundwater	INOL AL LISK	Not at risk	Good	Good	No		
31_3, 31_4,										
32_12, 32_13	IE WE G 0011	Recess	Groundwater	Not at risk	Not at risk	Good	Good	No		
30_14, 30_15,										
31_2, 31_3,										
31_4, 32_12	IE_WE_G_0012	Recess Marbles	Groundwater	Not at risk	Not at risk	Good	Good	No		
31_4, 32_12	IE_WE_G_0013	Clifden Marbles	Groundwater	Not at risk	Not at risk	Good	Good	No		
31_2, 32_12,										
32_13	IE_WE_G_0015	Letterfrack Marbles	Groundwater	Not at risk	Not at risk	Good	Good	No		
30_15, 31_2,										
32_11, 32_13	IE_WE_G_0016	Maamturks West Marbles	Groundwater	Not at risk	Not at risk	Good	Good	No		
30_15, 30_16,										
30_7, 31_2,										
31_4, 32_1,										
32_10, 32_11,										
32_12, 32_13,										
32_5, 32_6,										
32_7, 32_8, 32_9, 34_20,										
34_22, 34_5	IE_WE_G_0017	Clifden Castlebar	Groundwater	Review	Not at risk	Good	Good	No		
30_17, 30_3,			Sicanawater		TOPULTISK					
30_7, 32_10,										
32_6	IE_WE_G_0018	Killavally	Groundwater	Not at risk	Not at risk	Good	Good	No		
30_7, 32_6,										
34_22	IE_WE_G_0021	Aghagower	Groundwater	Not at risk	Not at risk	Good	Good	No		
30_6, 30_7,										
32_6, 34_21,										
34_22	IE_WE_G_0022	Ballyhean	Groundwater	Review	Review	Good	Good	No		
32_2, 32_3,										
32_5, 32_6	IE_WE_G_0023	Newport	Groundwater	Not at risk	Not at risk	Good	Good	No		
32_2, 32_3,										
32_5, 32_6,										
34_5	IE_WE_G_0024	Beltra Lough South	Groundwater	Not at risk	Not at risk	Good	Good	No		
32_5, 34_12,										
34_5	IE_WE_G_0025	Beltra Lough North	Groundwater	Not at risk	Review	Good	Good	No		

nended r Action	Recommended Areas for Action (reasons for selection)

Subcatchment Code	Waterbody Code	Waterbody Name	Waterbody Type	Risk 10-15	Risk 13-18	Status 10-15	Status 13-18	High Ecological Status Objective Waterbody	Significant Pressures	Recommended Areas for Action Name
32_2, 32_3,										
32_4, 32_5,										
33_4, 33_6,										
34_14, 34_5	IE_WE_G_0027	Malranny	Groundwater	Not at risk	Not at risk	Good	Good	No		
32_3, 32_5,										
33_4, 34_12,										
34_14, 34_5,										
34_8	IE_WE_G_0030	Laherdaun	Groundwater	Not at risk	Not at risk	Good	Good	No		
26B_2, 26D_9,										
30_10, 30_3,										
30_6, 30_7,										
30_9, 32_6,										
34_1, 34_15,										
34_16, 34_17,										
34_18, 34_2,										
34_20, 34_21,										
34_22, 34_3,										
34_4, 34_7,		Contractioned	Creation	Net et stale	Net et state	Card	Card	N		
35_4	IE_WE_G_0033	Swinford	Groundwater	Not at risk	Not at risk	Good	Good	No		
32_5, 32_6,										
34_10, 34_11,										
34_12, 34_16,										
34_17, 34_2,										
34_20, 34_22,										
34_3, 34_5,										
34_6, 34_7, 34_9, 35_12,										
34_9, 35_12, 35_4	IE WE G 0034	Foxford	Groundwater	Not at risk	Not at risk	Good	Good	No		
32_2, 32_3,	IE_WE_G_0034		Groundwater	NULALIISK	NOT AT LISK		0000	INO		
32_2, 32_3, 32_4, 33_1,										
33_10, 33_11,										
33_2, 33_3,										
33_4, 33_5,										
33_6, 33_8,										
33_9, 34_13,										
34_14	IE_WE_G_0057	Belmullet	Groundwater	Review	Not at risk	Good	Good	No		
32_13	IE_WE_G_0069	Inishbofin	Groundwater	Not at risk	Not at risk	Good	Good	No		
32_8	IE_WE_G_0071	Clare Island	Groundwater	Not at risk	Not at risk	Good	Good	No		
				The action of the second secon	THE ULTISK	COOL	5000			
32_5, 32_6	IE_WE_G_0082	Waste Facility (W0021- 01)	Groundwater	At risk	At risk	Poor	Poor	No	Other	

Ag: Agriculture

M+Q: Mines and Quarries

DWW: Domestic Waste Water

Peat: Peat Drainage and Extraction

ficant sures	Recommended Areas for Action Name	Recommended Areas for Action (reasons for selection)
er		

For: Forestry

Hymo: Hydromorphology

UR: Urban Run-off

UWW: Urban Waste Water

Ind: Industry

Note: Significant Pressures for Review waterbodies have not been included as they will need to be confirmed as part of an Investigative Assessment.