

**MWFP**

**Water Framework Directive  
Compliance Assessment**

**Maherabeg Beach Facility Centre for Water Sport  
Activities**

**Kerry County Council**

**September 2025**

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## 1. Introduction

Malachy Walsh and Partners (MWP) have been commissioned by Kerry County Council to undertake a Water Framework Directive (WFD) Compliance Assessment in respect of a proposed facility centre for water sport activities at Maherbeg Beach, Castlegregory, Co. Kerry.

In accordance with the WFD, proposals that have the potential to impact ‘water bodies’ as designated by the WFD are required to demonstrate that any actions would not cause a deterioration of the current status of any water body, and that the development does not prevent the achievement of the future status objectives of any water body.

This report considers water bodies within proximity to the proposed facility centre at Maherbeg Beach that have the potential to be impacted on by the development.

The purpose of this WFD Compliance Assessment report is to assist developers and regulators understand the impact that the development may have on the immediate water body and any linked water bodies and to ensure that the development will not prevent compliance with the WFD Objectives.

### 1.1 Competency of Assessor

This WFD Compliance Assessment has been undertaken by William Murphy and Caitriona Fox.

William Murphy (B.A, HDip, MSc.) is an Environmental Scientist at MWP. William has 4 years’ experience in ecological surveying, Ecological Impact Assessment (EIA), Environmental Impact Assessment Report (EIAR), Resource Waste Management Plans (RWMP), Construction Environmental Management Plans (CEMP) and various other requested reports. He is an appropriately qualified, trained and competent professional. He has completed numerous environmental assessments for a wide variety of projects.

Caitriona Fox (B.A, MSc) is an Environmental Consultant with over 20 years environmental consultancy experience. She is an Environmental Impact Assessment practitioner and has taken on the role of EIA Project Manager for a variety of large-scale EIA projects including wind farms, commercial, industrial and tourism developments. She has extensive experience in the management and compilation of environmental reports and has authored numerous specialist reports including water quality impact assessments, assimilative capacity assessments, air and climate impact assessments, population and human health impact assessment, landscape impact assessment, and material assets assessment for project EIAs.

## 2. Legislative Context

### 2.1 Water Framework Directive (WFD) (2000/60/EC)

The EU Water Framework Directive (WFD) (2000/60/EC) as amended was initially transposed into Irish law by the S.I. No. 722/2003 - European Communities (Water Policy) Regulations 2003 (as amended). These Regulations cover governance, the characterisation of WFD river basins and the development of River Basin Management

Plans (RBMP), environmental objectives and programmes of measures for achieving the latter, and criteria for determining quality standards.

The Regulations provide for the implementation of the WFD in Ireland, providing for the designation of all waters (rivers, lakes, estuarine waters, transitional coastal waters, and groundwaters) as 'water bodies', and setting objectives for the achievement of Good Ecological Status (GES) or Good Ecological Potential (GEP) and Good Chemical Status (GCS).

European Communities Environmental Objectives (Surface Waters) Regulations 2009 (S.I. No. 272/2009), as amended and the European Communities Environmental Objectives (Groundwater) Regulations 2010 (S.I. No. 9/2010) as amended give further effect to the WFD in Ireland.

## 2.2 WFD Objectives

There are two principal objectives of the WFD:

- The first objective requires that all water bodies must reach at least 'good' overall status by 2027, at the latest. For surface waters, good status is a combination of good ecological status (or potential) and good chemical status; and
- The second objective requires the status of each waterbody, including all the quality elements which make up the overall status, must not deteriorate relative to the baseline reported in the relevant RBMP.

The WFD is implemented through the River Basin Management Plans (RBMP) which comprises a six-yearly cycle of planning, action and review. RBMPs include identifying river basin districts, water bodies, protected areas and any pressures or risks, monitoring and setting environmental objectives. In Ireland, the first RBMP covered the period from 2010 to 2015 with the second cycle plan covering the period from 2018 to 2021 and the third cycle from 2022 to 2027. The River Basin Management Plan 2022-2027, Programme of measures to protect and restore our waters was published in September 2024.

The plan sets out key actions required to effectively implement mitigation measures to significantly improve water quality and identify where these measures should be deployed. In addition, the potential impacts of climate change on water resources, the planning for droughts and water scarcity is increasingly crucial.

## 2.3 WFD Classification

The information used in the classification of the status of our waterbodies is collected in the national WFD monitoring programme. Information on a range of different elements is collected by the EPA <https://gis.epa.ie/EPAMaps/Water>

- Biology (plants and animals living in and around water bodies);
- Water quality (concentrations of nutrients such as nitrogen and phosphorus and harmful chemicals such as pesticides);
- Water quantity (flows and levels of surface waters and groundwaters); and
- Hydromorphology (the physical habitat conditions of water bodies).

Rivers, lakes, estuaries and coastal waters can be awarded one of five statuses and groundwater just two (**Figure 2-1**) (Catchments.ie, 2023). Overall status is a composite measure that looks at both ecological status and chemical status. It considers all four assessment types under ecological status (biology, physico-chemical, Annex VIII substances and hydromorphology) as well as incorporating the results of the chemical status assessment. The

one-out-all-out rule is applied again here, so a water body must be good or better ecological status, and good (pass) chemical status assessment to be given a good overall status.

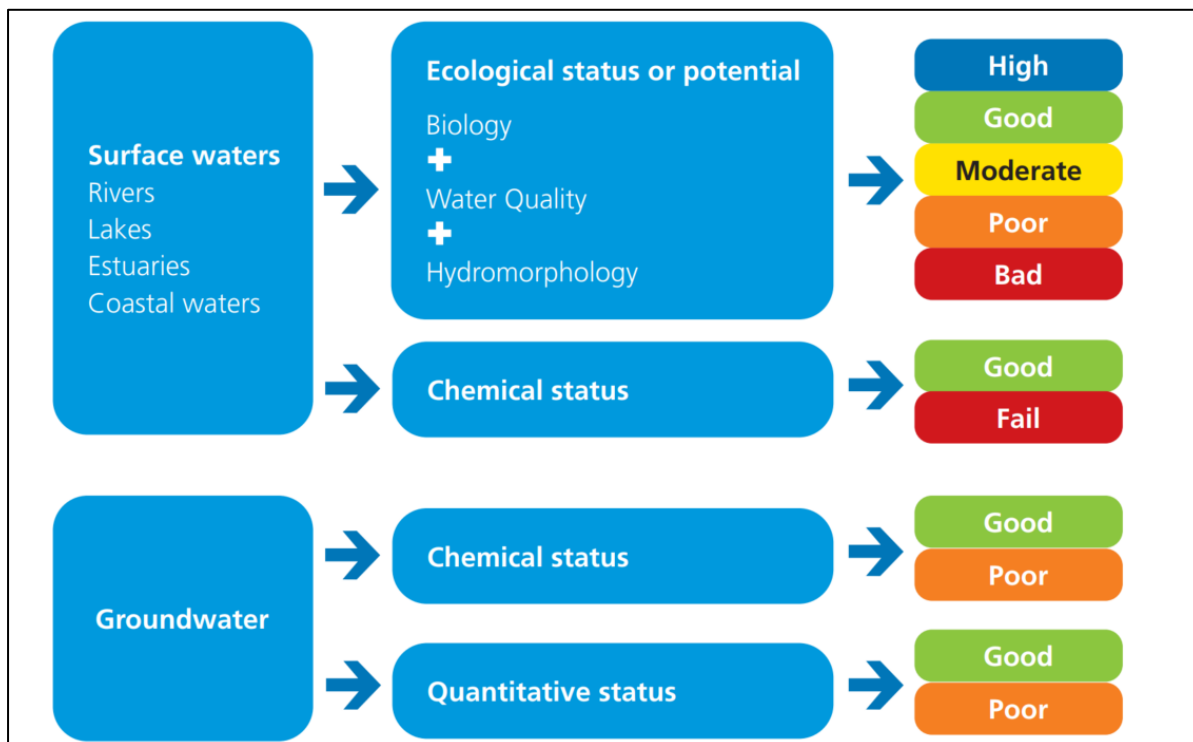


Figure 2-1: WFD Classification (Catchments.ie, 2023)

### 2.3.1 Ecological Status

Ecological status is recorded as high, good, moderate, poor or bad. ‘High’ represents ‘largely undisturbed conditions’. Eighteen different biological assessment methods have been developed to assess the condition of biological communities across the four surface water categories (EPA, Ireland’s National Water Quality Monitoring Programme 2022-2027).

Table 2-1: Biological Assessment Methods Used to Assess Ecological Status of various water bodies

Quality Element	Rivers	Lakes	Transitional Waters	Coastal Waters
<b>Macroinvertebrates</b>	Quality Rating System (Q-value)	Lake Acidification Macroinvertebrate Metric (LAMM)	Infaunal Quality Index (IQI)	Infaunal Quality Index (IQI)
	Acid Water Indicator Community Score (AWICs)			
<b>Aquatic Plants</b>	Mean Trophic Rank (MTR)	Free Macrophyte Index	Intertidal Seagrass tool	Intertidal Seagrass tool

Quality Element	Rivers	Lakes	Transitional Waters	Coastal Waters
	LEAFPACS		Saltmarsh Angiosperm Assessment Tool for Ireland (SMAATIE)	Saltmarsh Angiosperm Assessment Tool for Ireland (SMAATIE)
<b>Macroalgae</b>	Mean Trophic Rank (MTR)	Not applicable	Opportunistic Green Macroalgal Abundance (OGA tool)	Opportunistic Green Macroalgal Abundance (OGA tool)
	LEAFPACS			RSL – Rocky Shore reduced species list
<b>Phytoplankton</b>	Not applicable	IE Lake Phytoplankton Index	Phytoplankton biomass & composition	Phytoplankton biomass & composition
<b>Phytobenthos</b>	Revised form of Trophic Diatom Index (TDI)	Lake Trophic Diatom Index (IE)	Not applicable	Not applicable
<b>Fish</b>	Fish Classification Scheme (FCS2)	Fish in lakes 2 (FIL2)	Transitional Fish Classification Index (TFCI)	Not applicable
			Estuarine Multi- metric Fish Index (EMFI)	

### 2.3.2 Physico-Chemical Quality Status

Physico-chemical elements such as nutrients, dissolved oxygen, salinity, pH, etc., are measured to provide an indication of how these elements support the achievement of good or better ecological status. The physico-chemical quality elements and parameters that will be monitored in the 2022-2027 programme are shown in **Table 2-2**. Transparency in rivers is not measured due to the shallow nature of most Irish rivers.

**Table 2-2: Physico-Chemical Quality Elements and Parameters of Water**

Quality Element	Rivers	Lakes	Transitional Waters	Coastal Waters
<b>Transparency</b>	Not measured	Secchi depth, colour	Secchi Depth	Secchi Depth
<b>Thermal Conditions</b>	Temperature	Temperature	Temperature	Temperature

Quality Element	Rivers	Lakes	Transitional Waters	Coastal Waters
Oxygenation conditions	DO, BOD	DO	DO, BOD	DO, BOD
Acidification	pH, alkalinity, cations and anions, DOC	pH, alkalinity, cations and anions, DOC	pH	pH
Salinity	Conductivity	Conductivity	Salinity	Salinity
Nutrient Conditions	MRP, TA, TON	MRP, TA, TON, TP, Si	DIN, MRP, Si	DIN, MRP, Si

### 2.3.3 Hydromorphology Status

The WFD requires the assessment of the ecological status, which includes hydromorphological quality elements. Hydromorphology is the study of physical form, condition and processes within a surface water body, which create and maintain habitat. Where the hydromorphology of a surface water body has been significantly altered for anthropogenic purposes, such as water supply, flood protection or navigation, it can be designated as an Artificial or Heavily Modified Water Body (HMWB).

An alternative environmental objective, Good Ecological Potential (GEP) applies in these cases. In practice, this means that ecology must be as close as possible to that of a similar natural water body, but without compromising its human use. The water bodies of relevance to this project are not classified as HMWB so the classification of these is not discussed further.

## 2.4 WFD Protected Areas

The WFD requires a register of protected areas. These are protected for their use (such as fisheries or drinking water) or because they have important habitat and/or species that directly depend on water. The register includes areas identified by the WFD itself or other European Directives. These may include the following:

- Areas used for water abstraction - European Union (Water Policy) (Abstractions Registration) Regulations 2018 (S.I. No. 261 of 2018);
- Areas designated for the protection of economically significant aquatic species (Freshwater Fish Directive 78/659/EEC; Shellfish Directive 79/923/EEC);
- Recreational waters (Bathing Waters Directive 76/160/EEC);
- Nutrient Sensitive Areas (Nitrates Directive 91/676/EEC; Wastewater Treatment Directive 91/271/EEC);
- Areas of protected species or habitats where water quality is an important factor in their protection (Natura 2000 sites under Birds Directive 79/409/EEC and Habitats Directive 72/43/EEC); and

### 3. Assessment Methodology

#### 3.1 Appraisal Method

Any activity that is part of the proposed development and that could have the potential to lower the status of any quality elements of a water body or preclude the measures necessary to achieve good status must be assessed to determine its compliance with the WFD.

Published methodologies for the assessment of plans or projects in relation to undertaking WFD assessments across all types of water bodies that are specific to Ireland are not currently available. There is however an EU level guidance document of relevance titled “Water Framework Directive Project assessment checklist tool” (2024), published by the Joint Assistance to Support Projects in European Regions (JASPERS). In addition, the UK Planning Inspectorate Advice Note 18: The WFD (PINS, 2017) provides guidance on the WFD process, and the information required.

There are also several guidance documents from the UK that have been developed in relation to undertaking such assessments for the different water body types, predominantly written by the UK’s Environment Agency. These have been used as far as possible in the compilation of this assessment report.

The WFD compliance assessment process used for this assessment consists of various assessment stages as follows:

- Stage One: Screening. (This excludes any activities that do not need to go through the scoping or impact assessment stages);
- Stage Two: Scoping; (This identifies the receptors that are potentially at risk from an activity and need impact assessment); and
- Stage Three: Detailed Impact assessment. (This considers the potential impacts of an activity, identifies ways to avoid or minimise impacts, and indicates if an activity may cause deterioration or jeopardise the water body achieving Good Status).

#### 3.2 Data Resources

The following data resources and reports were utilised to inform this assessment:

- Geological Survey of Ireland Online Mapping (GSI, 2025)
- Environmental Protection Agency Online Mapping (EPA, 2025)
- MWP Document: 25609-MWP-ZZ-ZZ-RP-CE-6001-P01 Wastewater Treatment System Design Report

## 4. Project Description

### 4.1 Site Location and Context

The proposed development site is located in the townland of Maherabeg, approximately 2.9 km north of the village of Castlegregory, **Figure 4-1**. This is located on the Maharees tombolo, a coastal feature of the Dingle Peninsula. The development will be located at Maherabeg Beach, with the Sandy Bay Caravan and Camping Park adjacent to the proposed development on the western side. There is also the Splash Sports Watersports Centre and Beal Geal Sauna and Coffee shop north of the proposed development. An unnamed road travelling north from Castlegregory provides access to the area via vehicle.

The area is located along the Wild Atlantic Way tourist route for the west coast of Ireland, with Castlegregory being a popular stop along the route, and the Dingle Peninsula being a significant tourist area for both national and international visitors. The proposed development is located on the Maharees tombolo, with several beaches and attractions based on its coastal features. Nearby, at the base of the tombolo is Stradbally Mountain, a popular area for hikes. Mount Brandon is located to the west of the proposed development and is also a popular location for recreational hiking. Replacing the current facilities with upgraded and more modern facilities will aid in managing the number of tourists to the area, especially during peak season.

The existing site currently provides toilet facilities to beach users in the form of a portable structure on a concrete base housing free-to-use male and female toilets (WCs), male urinals and wash hand basins (WHBs). These toilet facilities are connected to an existing septic tank with percolation area. Kerry County Council provide and maintain these facilities on a year-round basis.



Figure 4-1: Location of Proposed Development Site

## 4.2 Development Overview

The proposed development will occupy an area of approximately 2,995m<sup>2</sup>, and includes:

- new sanitary facilities, internal and external showers,
- new wastewater treatment system and polishing filter
- upgrading of vehicle entrance at the south of the proposed development
- provision of 2no. disabled parking spots, and
- Universal access and existing ramp upgrade to the beach.

The proposed facility will contain a number of resources such as indoor and outdoor showers and serviced toilets, as well as external and internal seating. The proposed facility will also include a multi-functional outdoor induction space for operators and visitors. Ancillary upgrade works, including ancillary upgrade of existing beach access ramp to provide universal beach access, complementary with the blue flag beach designation, are also proposed. The proposed beach access ramp upgrade works will be confined to the footprint of the existing ramp, avoiding sensitive adjoining habitats. A new wastewater and separate stormwater treatment system are proposed to be constructed on-site, and these will replace the existing system and improve wastewater and stormwater management on-site.

### 4.2.1 Wastewater Treatment System

The proposed facilities will include seven shower/changing rooms, five WCs and four free outdoor cold washdown showers. These facilities will be pay-per-use. It is proposed to retain provision of the free-to-use facilities for general beachgoers and thus the existing toilets will also be retained on-site albeit relocated.

A new Wastewater Treatment System (WWTS) is required to cater for both the proposed pay-per-use toilet/shower facilities and existing free toilet facilities.

The proposed WWTS will consist of the following main components:

- - 1 no. new precast concrete primary/buffer tank (7,500 litres),
- - 1 no. new precast concrete reactor tank (4,500 litres) and
- -1 no. 200m<sup>2</sup> soil polishing filter with 2 no. closed cell percolation modules (2 streams).

The proposed wastewater treatment system has been designed for the site physical and usage parameters and is considered sufficient to achieve a very high level of treatment of the proposed wastewater and to safeguard the receiving environment. The use of a raised percolation area will ensure there will be no direct discharge to the beach or tide and that tertiary level treatment of effluent will be achieved prior to discharge to ground.

A detailed description of the proposed Wastewater Treatment System and discharge quality is provided in MWP Document: 25609-MWP-ZZ-ZZ-RP-CE-6001-P01 Wastewater Treatment System Design Report.

The projected maximum daily wastewater discharge is expected to be circa 3.7m<sup>3</sup>. **Table 4-1** gives the estimated quality of the treated discharge, while **Table 4-2** presents the on-site domestic wastewater treatment minimum performance standards from the EPA Code of Practice Domestic Wastewater Treatment Systems 2021.

**Table 4-1: Treated Wastewater Quality**

Parameter	BOD	SS	COD	Ammonia	Phosphorus
Secondary Treatment Standard	25mg/l	35mg/l	125mg/l	<5mg/l	<3mg/l
Tertiary Treatment	5mg/l	5mg/l	25mg/l	<5mg/l	<3mg/l

**Table 4-2: Domestic Wastewater Standards**

Parameter	Standard mg/l
BOD	≤20
SS	≤30
Ammonium Nitrogen	≤20

#### 4.2.2 Stormwater management

The extent of hardstanding on-site is currently minimal and the site is largely grassed. Surface run-off will be managed via temporary attenuation ponds during construction, if required.

During operation, it is proposed that stormwater will be conveyed to a proposed new stormwater soakaway area via new 150mmØ UPVC storm pipes and 150mmØ perforated land drains. Refer to MWP Drawing No. 23173-MWP-00-01-DR-C-0105.

#### 4.2.3 Water Supply

Water supply will remain unchanged and will be via the existing Úisce Eireann watermain on the main road.

### 4.3 Construction Works

The construction method for the proposed development is outlined below.

- Fencing off of site and site clearance works.
- Establishment of site compound and storage area for materials, fuels and oils.
- Removal of existing seasonal toilet facilities.
- Demolition of 100mm unreinforced slab and the existing septic tank that services the current toilet facilities. Septic tank will be emptied prior to removal.

- Excavation works and installation of new wastewater treatment system, polishing filter and percolation area.
- Modification of existing water and power connections on site to join with new structure.
- Building of new shared facility including internal and external showers, serviced toilets, changing cubicles, lockers and seating.
- Enlarging the vehicle entrance at the site of the site and constructing 2 no. disabled parking spots.
- Upgrading of access path to Maherabeg Beach.

## 5. Receiving Environment

### 5.1 Catchment Description

The current status and measures designed to achieve the water body objectives are set out by the EPA in the RBMP (2022-2027). For this RBMP cycle, a single national River Basin District has been defined for Ireland. This is broken down into 46 catchment management units.

The proposed development is located within Hydrometric Area No. 23, also known as the Tralee Bay-Feale Catchment (HA 23). The catchment is divided into 14 subcatchments with 80 river waterbodies, 12 lake bodies, 6 transitional waterbodies, 7 coastal waterbodies and 12 ground waterbodies (Figure 5-1). The proposed development is located in the Owencashla\_SC\_010 subcatchment (Figure 5-2).

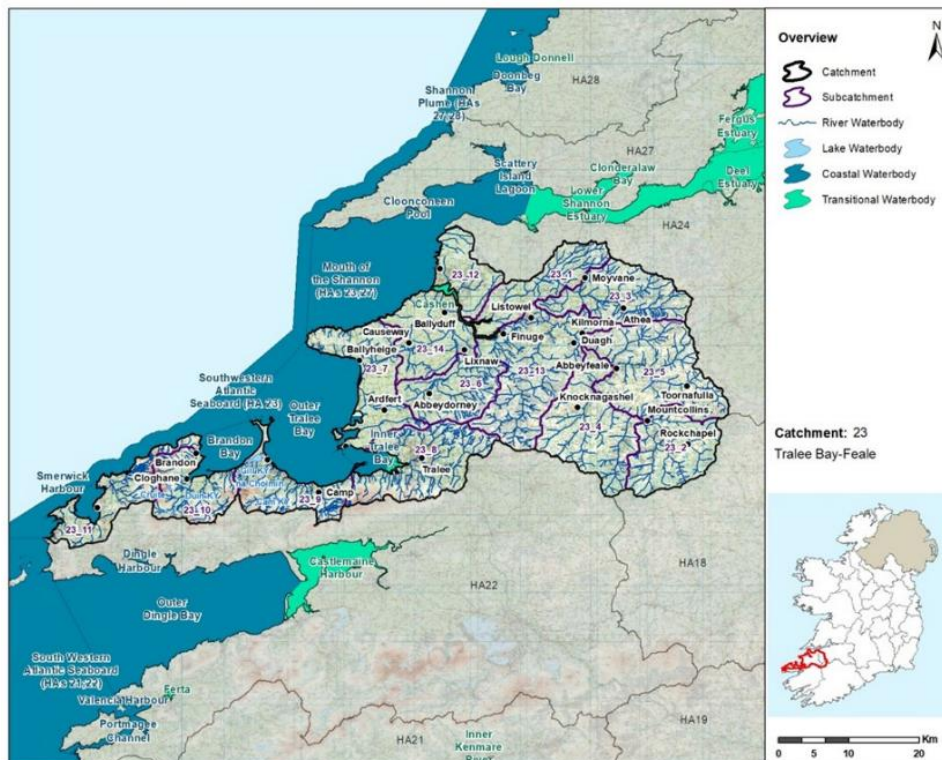


Figure 5-1: The Tralee Bay-Feale Catchment (EPA, 2024)

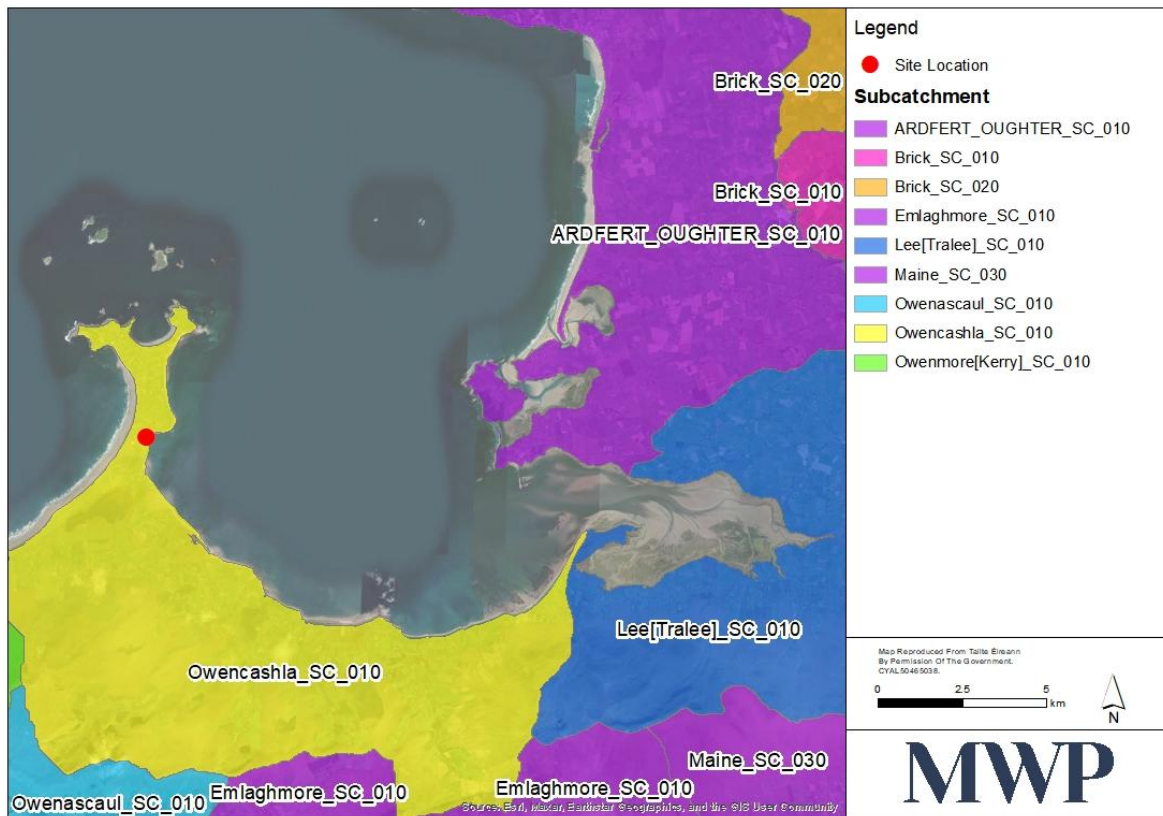
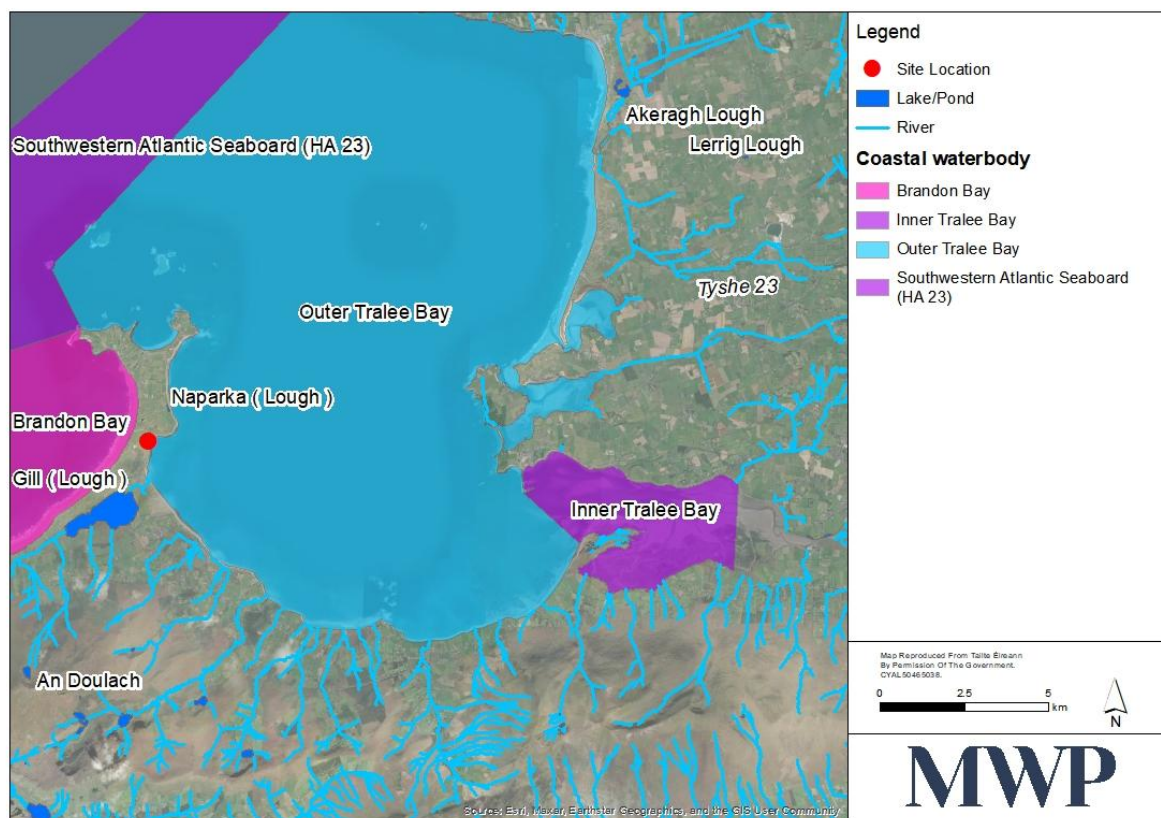


Figure 5-2: Sub-catchment Locations (EPA Maps, 2025)

## 5.2 Relevant Surface Waterbody and Status

The surface water features (Figure 5-3) in the vicinity of the proposed development are:

- Outer Tralee Bay (IE\_SH\_040\_0000) is located to the east of the proposed development, adjacent to Maherabeg Beach.
- Gowlane\_010 (IE\_SH\_23G160300), known as the Killiney River, is approximately 1km south of the proposed development, flowing from Lough Gill into Tralee Bay.
- Lough Gill is approximately 1.8 km southeast of the proposed development and is classed as both a transitional waterbody (IE\_SH\_040\_0100), and a lake (IE\_SH\_23\_72).
- Brandon Bay (IE\_SH\_030\_0000) is a coastal waterbody located on the western side of the tombolo, approximately 675m from the proposed development.



**Figure 5-3: Location of Surface Water Bodies**

The EPA WFD River quality status for the Gowlane\_010 is considered ‘Poor’ for the period of 2016-2021 and was deemed to have a ‘Review’ status under the WFD Risk assessment. Lough Gill is a 1.4km<sup>2</sup> lake that is classed ‘At Risk’ by the WFD. The monitoring period of 2016-2021 recorded the lake as having ‘Moderate’ ecological status and a chemical surface water status of ‘Good’. For its assessment as a transitional waterbody, it was deemed to have an ‘Unassigned’ status and a ‘Review’ WFD risk assessment.

The Outer Tralee Bay coastal waterbody, which has a WFD risk status of ‘Review’ and a ‘Good’ ecological status following the 2016 – 2021 monitoring period. The Brandon Bay coastal waterbody is the same, having a ‘Good’ ecological status and a WFD Risk status of ‘Review’.

**Table 5-1** provides a summary of the WFD status for the identified surface waterbodies, and the pressures they are experiencing.

**Table 5-1: Surface Water Body Status**

Waterbody Name	Code	Type	Status 2016-2021	At Risk of Not Achieving Good Status	Pressures	Pressure Category	Hydrological Connectivity to Natura Site
Gowlane_010	IE_SH_23G160300	River	Poor	Review	Yes	Agriculture	Yes
Lough Gill	IE_SH_23_72	Lake	Moderate	At Risk	Yes	Agriculture	Yes

Waterbody Name	Code	Type	Status 2016-2021	At Risk of Not Achieving Good Status	Pressures	Pressure Category	Hydrological Connectivity to Natura Site
Lough Gill	IE_SH_040_0100	Transitional Waterbody	Unassigned	Review	Yes	Anthropogenic Pressures	Yes
Outer Tralee Bay	IE_SH_040_0000	Coastal Waterbody	Good	Review	Yes	Anthropogenic Pressures	Yes
Bandon Bay	IE_SH_030_0000	Coastal Waterbody	Good	Review	No	n/a	No

### 5.3 Relevant Groundwater Body and Status

The Groundwater Body underlying the site is the Brandon Head Groundwater Body (GWB) (IE\_SH\_G\_044). Currently, the EPA classifies the Brandon Head GWB as having a WFD 2016-2021 Status of ‘Good’ and has a current WFD risk assessment score of ‘Not at Risk’.

Groundwater vulnerability is a term used to represent the intrinsic geological and hydrogeological characteristics that determine the ease at which the groundwater may be contaminated generally by human activities. The Geological Survey of Ireland (GSI) has mapped the vulnerability in the area of the proposed development as ‘High’. The ‘High’ rating at the proposed sites gives a depth of 3-5m for overlying subsoils. The predominate sediment at the proposed development site is Windblown sands and dunes. The ‘High’ rating for the groundwater vulnerability represents the risk of contamination by human activities. **Figure 5-4** shows the groundwater body, while **Figure 5-5** illustrates the groundwater vulnerability beneath the site and within the surrounding area.

There is one bedrock aquifers underlying the site, according to the GSI ([www.gsi.ie/mapping](http://www.gsi.ie/mapping)), a Locally Important Aquifer- Karstified. To the North at the end of the tombolo is a Locally Important Aquifer - Bedrock which is Moderately Productive only in Local Zones. The same aquifer type is also south of the proposed development site. **Figure 5-6** shows the aquifers located in the vicinity, while **Table 5-2** provides a summary of the WFD status for the groundwater aquifer under the site. The water quality remained of good quality from 2010 to the latest results in 2021 and the aquifer was not at risk in terms of the WFD status. This means that water quality standards and thresholds are being met, and the environmental objective of the associated groundwater is being achieved. The current status is ‘Review’, meaning the water body is not considered to be At Risk but requires further evidence that the objectives are being met, typically with ongoing monitoring and/or possibly modelling.

**Table 5-2: Groundwater Status**

Waterbody Name (Code)	Type	Status 2010-2015	Status 2013-2018	Status 2018-2021	At Risk of Not Achieving Good Status	Pressures
Brandon Head IE_SH_G_044	Groundwater	Good	Good	Good	Not at Risk	None indicated

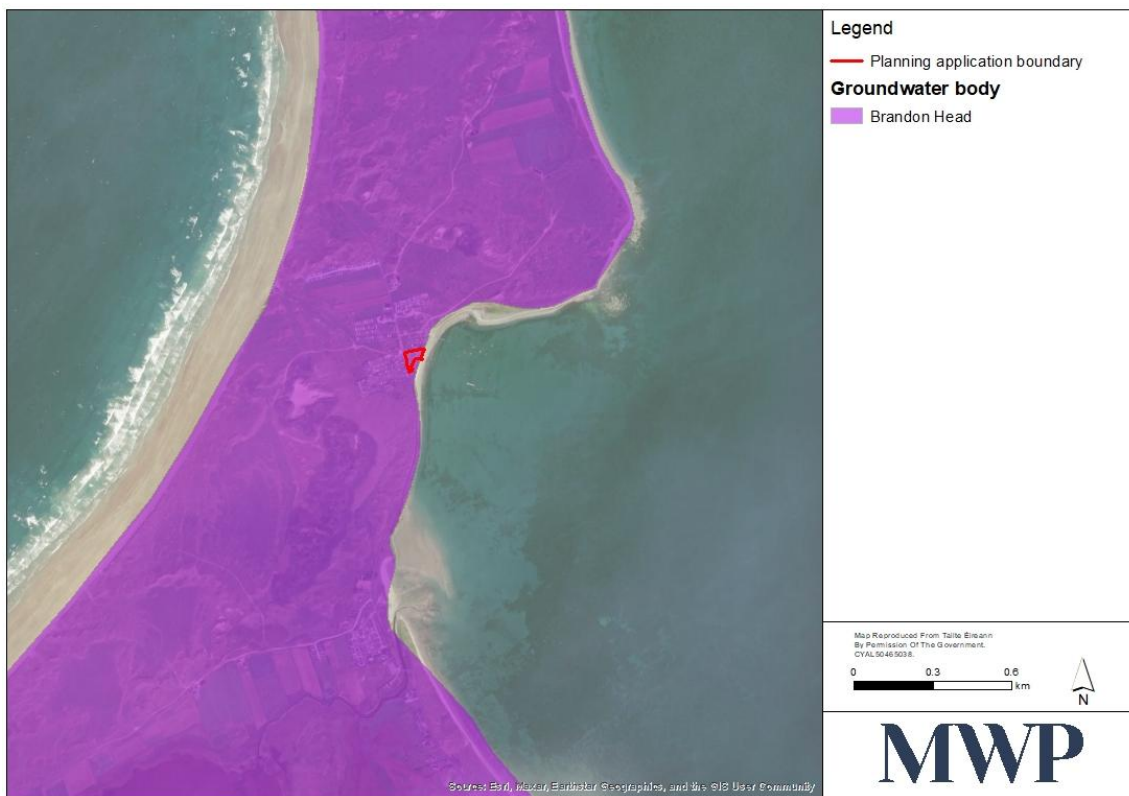


Figure 5-4: Ground Water Body



Figure 5-5: Groundwater Body Vulnerability

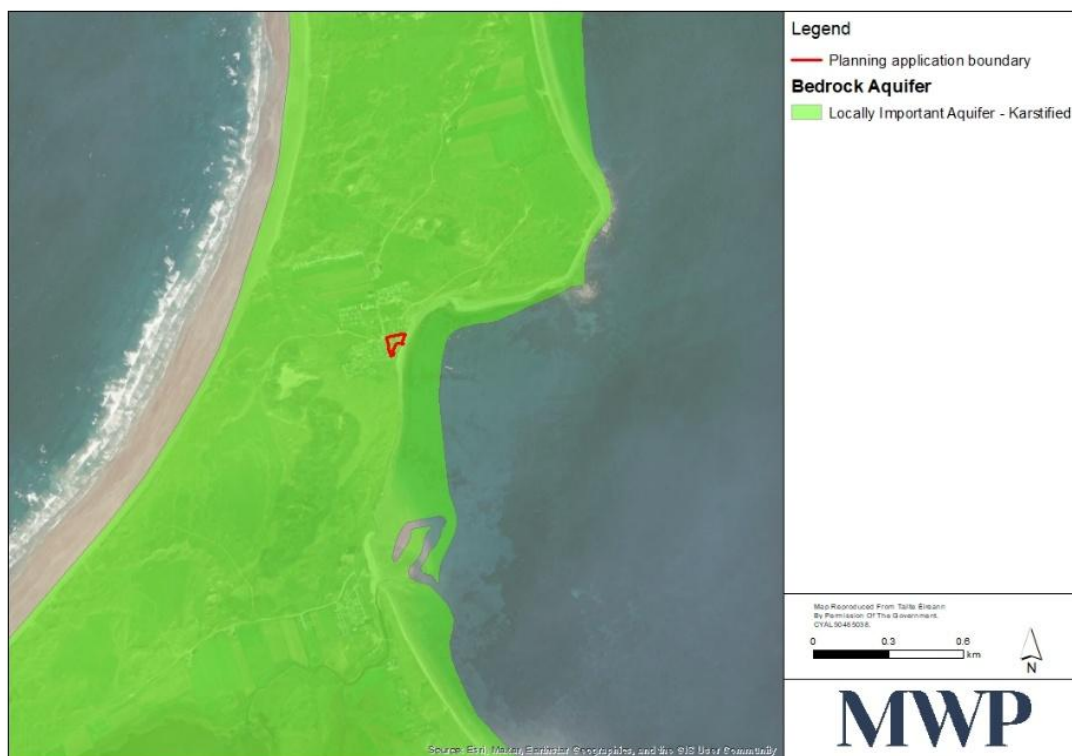


Figure 5-6: EPA Bedrock Aquifer Classification

### 5.4 Drinking Water/ Abstractions

There are several waterbodies designated for Abstraction for Drinking Water under Article 7 of the WFD. These are designated as ‘All bodies of water used for the abstraction of water intended for human consumption providing more than 10m<sup>3</sup> a day as an average or serving more than 50 persons, and those bodies of water intended for such future use’.

The GWB Brandon Head underlies the site of the proposed development, while the Gowlane\_010 river approximately 1 km south of the proposed development site are both designated under Article 7 for drinking water. The closest lake water body designated for drinking water abstraction is Acummeen, approximately 7.8 km southeast from the proposed development. These are shown in **Figure 5-7**.



**Figure 5-7: Lakes and Rivers with Drinking Water Supplies**

The Geological Society of Ireland delineates Public Supply Source Protection Areas for drinking water to protect these public water supplies. These are split into inner and outer protection areas, with the inner area designed to prevent immediate threats to the water source. The outer area encompasses the Zone of Contribution (ZoC) that contributes to the inner areas water supply. There is no public water supply (PWS) sources located in the vicinity of the proposed development. The closest PWSs are to the east, across Tralee Bay, which are the Ballyheigue PWS, approximately 18.1 km from the proposed development site, and the Ardferf PWS, approximately 17.1 km (Figure 5-8).

There is a National Federation of Group Water Schemes (NFGWS) community water scheme located at Loughar, approximately 10.3 km southeast of the proposed development.

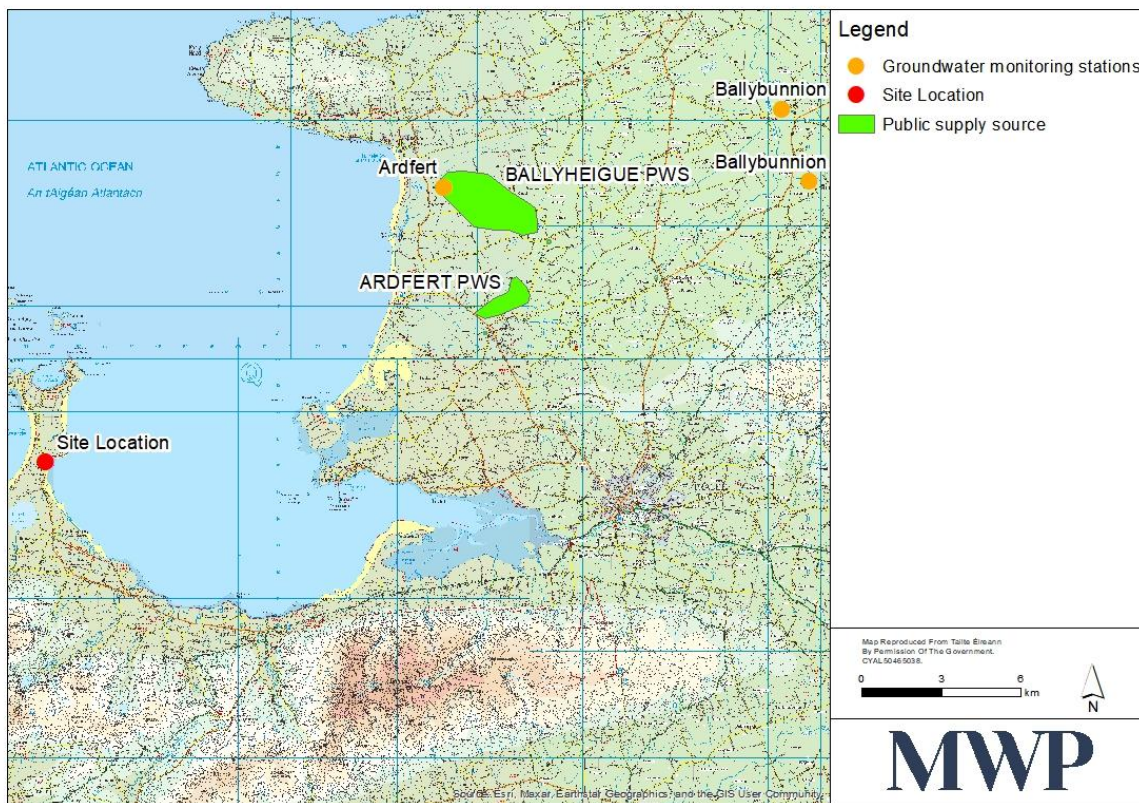


Figure 5-8: PWS Locations

According to the GSI database, the closest recorded wells are southwest of the proposed development site, approximately 5.9 km. The wells, IE\_GSI\_GW\_Well\_9002 and IE\_GSI\_GW\_Well\_9001, are dug wells at a depth of 11 m and 12.2 m respectively, and both do not meet the bedrock in the area. Both these wells are also classed as poor yielding and are shown along with other wells in the vicinity in **Figure 5-9**.

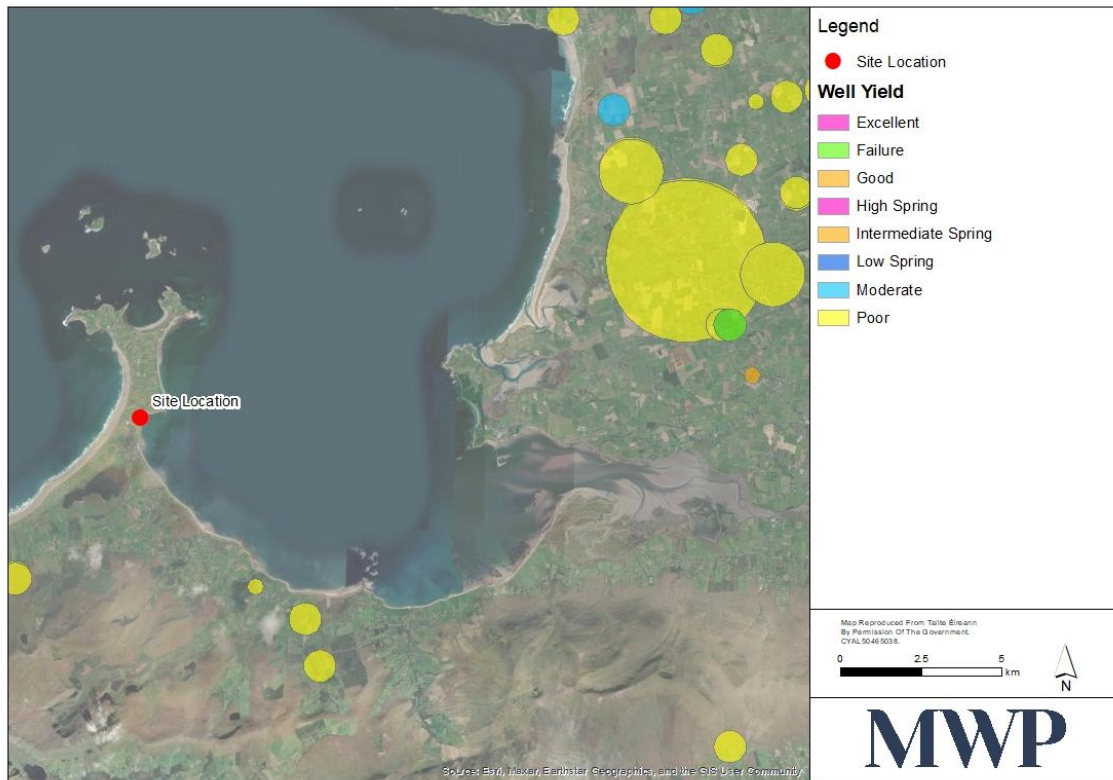


Figure 5-9: GSI Groundwater Wells and Springs

## 5.5 Bathing Waters

Maherabeg Beach, adjacent to the proposed development is a designated bathing water area and Blue Flag beach, the only one on the northern side of the Dingle Peninsula and has been a Blue Flag beach since 1995. Bathing water quality is sampled throughout the bathing season, June 1<sup>st</sup> to September 15<sup>th</sup> each year, and was last sampled on the 14<sup>th</sup> of July 2025, reporting Excellent quality.

South of the proposed development is Castlegregory beach, another bathing water area which was sampled on the same date and returned an Excellent quality. Derryroe Beach is located approximately 12.4 km southeast of the proposed development and is not a designated bathing water area. The water quality at the beach was sampled on 30<sup>th</sup> June 2025, returning an Excellent quality. Fenit Beach is a designated bathing water area, located approximately 10.9 km east across Tralee Bay. It is also a Blue Flag beach, having attended its status in 1997. Water quality sampling took place on the 14<sup>th</sup> of July 2025, returning an Excellent result for water quality. All beaches and bathing waters are shown in **Figure 5-10**.



Figure 5-10: Bathing Waters and Beaches

## 5.6 Nutrient Sensitive Waters

Nutrient sensitive areas document in December 2018 to represent information in the RBMP Cycle 3. During this undertaking, no rivers, lakes, or estuaries were designated in the vicinity of the proposed development, the closest being the Lee Estuary Upper (Tralee)(IE\_SH\_050\_0100) approximately 17.5 km east of the proposed development across Tralee Bay, **Figure 5-11**. There are no salmonoid rivers designated on the Dingle Peninsula.

The Sea Fisheries Protection Agency (SFPA) monitors and publishes classified bivalve production areas in Ireland as required by Directive 2006/113/EC on the quality required of shellfish waters and brought into Irish legislation under S.I. No. 268 of 2006. This classification is graded against *E. coli* thresholds, with gradings of A, B and C available. Areas graded ‘A’ are suitable for sale for direct human consumption, requiring no treatment. Grade ‘B’ requires purification and treatment before being suitable for human consumption, while grade ‘C’ areas require bivalves to under a least 2 months relaying in cleaner waters or an approved heat treatment before being suitable for human consumption.

The proposed development is adjacent to the Maharees designated shellfish water, which runs along the eastern side of the Maharees Peninsula from Castlegregory up to the northern point near Kilshannig. It is designated for Native Oyster species and has a seasonal classification of ‘A’ from December 1<sup>st</sup> to June 1<sup>st</sup> each year, reverting to class ‘B’ outside of this period. Approximately 12 km to the east across Tralee Bay is another Designated Shellfish Area for Native Oysters with a classification of ‘B’. Tralee Bay itself is licenced as an aquaculture site as a Fishery Order, licence no. T06-004. The licence is held by the Tralee Oyster Fisheries Society Ltd for European Flat Oyster. The area of the order area is 30,527.11 ha, encompassing the whole of Tralee Bay out to Sron Bhroin on the Dingle Peninsula up to Kerry Head. These are all illustrated in **Figure 5-12**.



## 5.7 Natura 2000 Protected Areas

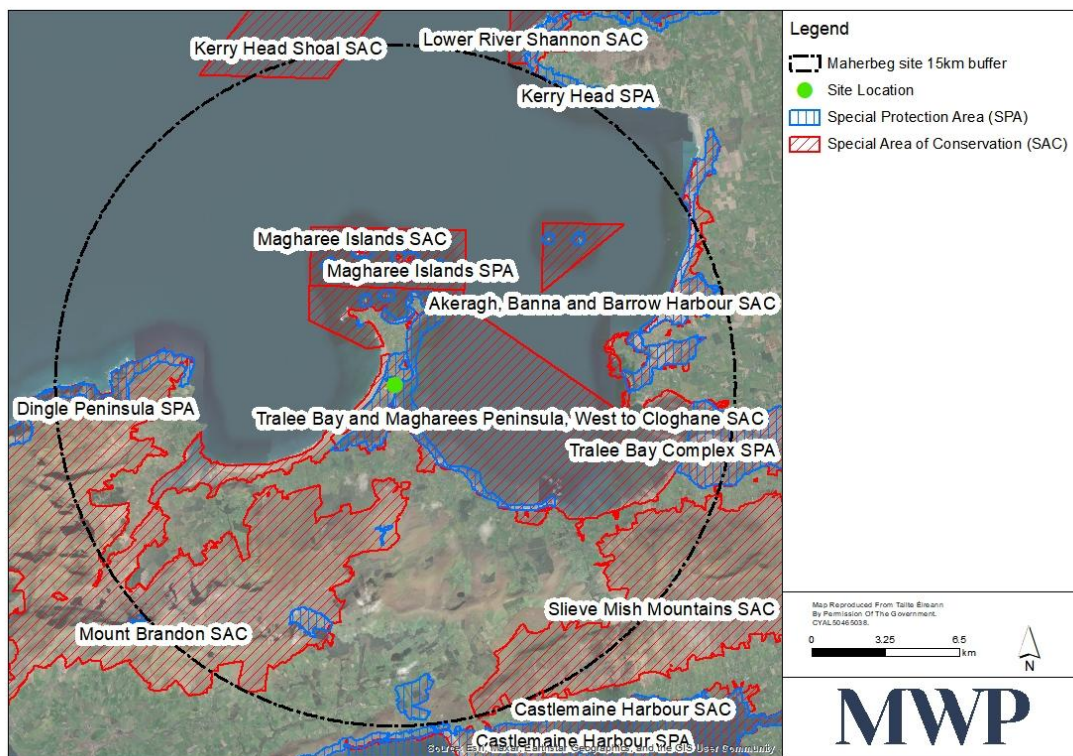
There are several sites designated, Special Areas of Conservation (SAC) and Specially Protected Areas (SPA), as part of the Natura 2000 network. The proposed development is adjacent to the Tralee Bay and Magharees Peninsula, West to Cloghane SAC (002070). The proposed development does not transect the SAC. Approximately 4.3 km north of the proposed development is the Magharee Islands SAC (002261), and south of the proposed development, approximately 4.1km, is the Mount Brandon SAC (000375).

The proposed development is adjacent to the Tralee Bay Complex SPA (004188) and the Dingle Peninsula SPA (004153). Approximately 3.6 km north of the site is the Magharee islands SPA (004125) at its closest point.

**Figure 5-12** presents these Natura 2000 sites and others in the surrounding area.

Annex I habitats within the vicinity of the proposed development include large shallow inlets and bays (1160), mudflats and sandflats not covered by seawater at low tide (1140), coastal lagoons (1150), and reefs (1170). Annex II water dependent species located within the identified Natura 2000 include Otter (1355) (*Lutra lutra*), Petalwort (1395) (*Petalophyllum ralfsii*), Freshwater Pearl Mussel (1029) (*Margaritifera margaritifera*), and Killarney Fern (6985) (*Vandenboschia speciosa*). A full assessment of these species and habitats are presented in the Appropriate Assessment Screening Report submitted with this application.

There are no Natural Heritage Areas (NHAs) located in the vicinity of the proposed development, however there are several proposed NHAs, **Figure 5-13**. Tralee Bay and Magharees Peninsula, West to Cloghane and Mount Brandon. Both of these NHAs are within the SACs of the same name in the area, with the SACs being larger in size. The islands at the north of the Maharees peninsula are all designated as individual pNHAs, Gurrig Island (001963), Inishtooskert and Illaunimmil (001965), Illauntannig (001964), Mucklaghmore Island (001962), and Illainnabarnagh (001359). All of these pNHAs are contained within the larger Magharee Islands SAC.



**Figure 5-13: Natura 2000 Sites**

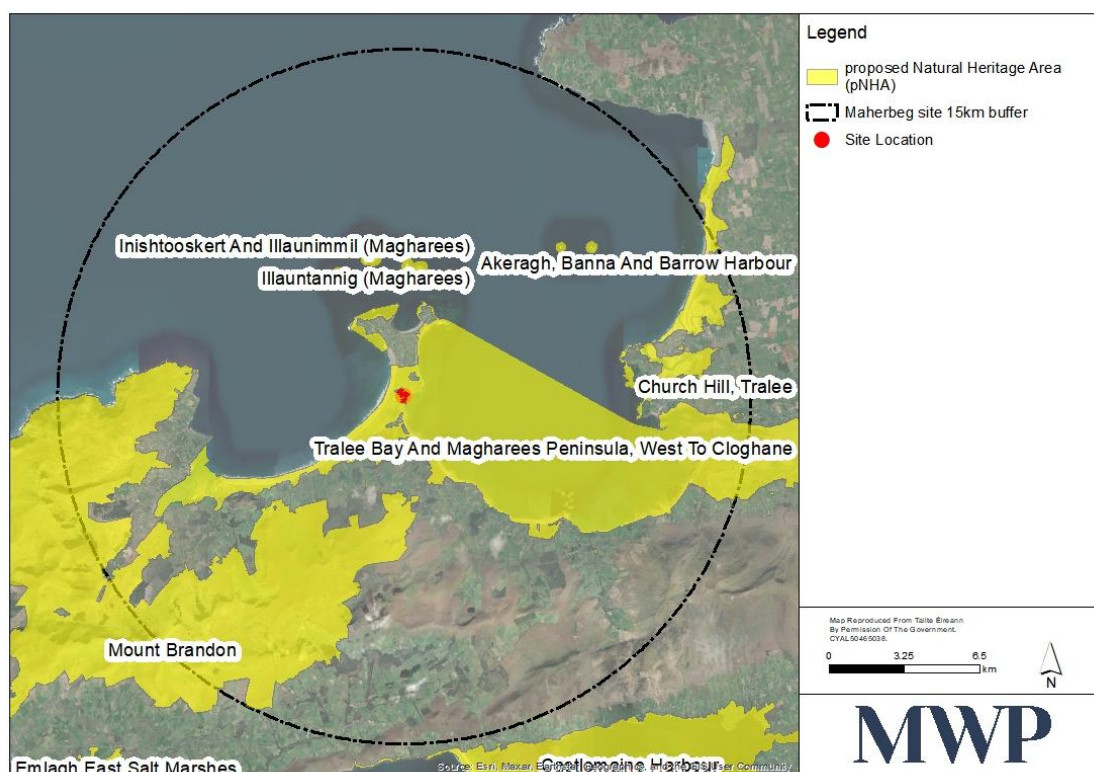


Figure 5-14: Proposed NHAs

## 6. Compliance Assessment

Any activity that is part of the proposed development and that could have the potential to lower the status of any of the quality elements of a water body or preclude the measures necessary to achieve good status must be assessed to determine its compliance with the WFD.

Stage 1: Screening aims to determine if the proposed development has impact pathways to WFD water bodies. This includes collating available information on the project and baseline environment of the water bodies which could potentially be impacted. Should there be an activity that is determined to be screened in for further assessment, this will move forward to Stage 2: Scoping. During this stage, if an impact is screened in, this will be carried forward to Stage 3: Impact Assessment.

### 6.1 Stage One: Screening

Stage 1 is to identify the extent to which the proposal is likely to affect the water bodies and to identify what activities should go through the scoping or impact assessment stages. This section therefore:

- Defines which activities have been screened in for further assessment, considering the activities that may result from construction and operation of the Proposed Development that could directly or indirectly impact water bodies.
- Identifies the relevant water bodies (surface and groundwater) that could be directly or indirectly impacted by the Proposed Development and defines which water bodies have been screened in for further assessment.

In order to undertake the screening assessment and identify water bodies that are potentially at risk, the project was divided onto phases and activities, see **Table 6-1**. The operational life of the Proposed Development is expected to be in excess of 50 years. There is no decommissioning envisaged for the Proposed Development.

**Table 6-1: Project Phases and Activities**

Project Phase	Activity
Construction	Excavation of soil and sub soil
	Stockpiling of excavated soils
	Removal of seasonal toilet facilities
	Demolition of 100mm concrete apron and removal of existing septic tank
	Installation of wastewater treatment system
	Construction of new shared facility
	Enlargement of south vehicle entrance
	Installation of 2 no. disabled parking spots
	Use of Fuels
	Use of concrete
	Ancillary Works
Operation	General maintenance works
	Operational Wastewater Discharges

The results of the screening exercise are summarised in **Table 6-2**.

**Table 6-2: Results of Screening Exercise**

Phase	Activity	Water Resource	Water Body Name and ID Number	Impact	Screening for Further Assessment	Justification
Construction	Site clearing and excavation	Groundwater	Brandon Head (IE_SH_G_044)	Potential from the excavation for material to enter the waterbodies, particularly during periods of heavy rainfall.	Screened In	Potential for material from the excavation works to enter the groundwater body.
		Surface Water	Killiney River (Gowlane_10)		Screened Out	No direct hydrological connection to the proposed development site. The Killiney river flows into Tralee Bay, making it unlikely for pollutants to flow up the river. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Lough Gill (IE_SH_23_72 and IE_SH_040_0100)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Outer Tralee Bay (IE_SH_040_0000)		Screened In	Potential for the material from excavation to enter the water body given proximity to the proposed development.
Construction	Removal of existing seasonal facilities	Groundwater	Brandon Head (IE_SH_G_044)	Potential from the removal of the existing facility to disturb ground and material to enter waterbodies, particularly during periods of heavy rainfall.	Screened Out	The existing facilities are in a temporary structure on a concrete base that can be easily removed without impacts to the underlying GWB.
		Surface Water	Killiney River (Gowlane_10)		Screened Out	No direct hydrological connection to the proposed development site. The existing facilities are in a temporary structure on a concrete base that can be easily removed. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring

Phase	Activity	Water Resource	Water Body Name and ID Number	Impact	Screening for Further Assessment	Justification
			Lough Gill (IE_SH_23_72 and IE_SH_040_0100)		Screened Out	No direct hydrological connection to the proposed development site. The existing facilities are in a temporary structure on a concrete base that can be easily removed. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring.
			Outer Tralee Bay (IE_SH_040_0000)		Screened Out	The existing facilities are in a temporary structure on a concrete base that can be easily removed without impacts to the adjoining SWB.
Construction	Demolition of Concrete Apron and removal of existing septic tank	Groundwater	Brandon Head (IE_SH_G_044)	Potential from the demolition of the concrete apron and removal of septic tank to disturb material that may enter nearby waterbodies, particularly during periods of heavy rainfall.	Screened In	Potential for the material from the demolition and excavation to enter the water body given proximity to the proposed development.
		Surface Water	Killiney River (Gowlane_10)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Lough Gill (IE_SH_23_72 and IE_SH_040_0100)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Outer Tralee Bay (IE_SH_040_0000)		Screened In	Potential for the material from the demolition and excavation to enter the water body given proximity to the proposed development.
Construction	Construction of Wastewater	Groundwater	Brandon Head (IE_SH_G_044)	Excavation work and the installing of the wastewater treatment may disturb	Screened In	Potential for the material from the installation works to enter the water body given proximity to the proposed development.

Phase	Activity	Water Resource	Water Body Name and ID Number	Impact	Screening for Further Assessment	Justification
	treatment system	Surface Water	Killiney River (Gowlane_10)	material that could enter the nearby waterbodies.	Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Lough Gill (IE_SH_23_72 and IE_SH_040_0100)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Outer Tralee Bay (IE_SH_040_0000)		Screened In	Potential for the material from the installation works to enter the water body given proximity to the proposed development.
Construction	Northern Slope Beach Universal Access and Ramp Improvement	Groundwater	Brandon Head (IE_SH_G_044)	Potential for material during the improvement works to run off into surface waterbodies.	Screened In	Potential for the material from the upgrade works to enter the water body given proximity to the proposed development.
		Surface Water	Killiney River (Gowlane_10)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Lough Gill (IE_SH_23_72 and IE_SH_040_0100)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Outer Tralee Bay (IE_SH_040_0000)		Screened In	Potential for the material from the upgrade works to enter the water body given proximity to the proposed development.

Phase	Activity	Water Resource	Water Body Name and ID Number	Impact	Screening for Further Assessment	Justification
Construction	Construction of building and public realm works	Groundwater	Brandon Head (IE_SH_G_044)	Potential for material run-off to enter the waterbodies, particularly during periods of heavy rainfall.	Screened In	Potential for materials used in the construction of the proposed development to enter the groundwater body accidentally due to proximity to the waterbody.
		Surface Water	Killiney River (Gowlane_10)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Lough Gill (IE_SH_23_72 and IE_SH_040_0100)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Outer Tralee Bay (IE_SH_040_0000)		Screened In	Potential for materials used in the construction of the proposed development to enter the waterbody accidentally due to proximity to the waterbody via run off.
Construction	Use of fuels, oils and concrete on site	Groundwater	Brandon Head (IE_SH_G_044)	Potential for run-off from machinery operation and concrete pouring to enter waterbodies, particularly during periods of heavy rainfall. Potential to enter groundwater body during a spill event.	Screened In	Works and activity are located on the GWB, and potential spills or leaks could leach through soil and into GWB.
		Surface Water	Killiney River (Gowlane_10)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.
			Lough Gill (IE_SH_23_72 and IE_SH_040_0100)		Screened Out	No direct hydrological connection to the proposed development site. Works and activity are downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works.

Phase	Activity	Water Resource	Water Body Name and ID Number	Impact	Screening for Further Assessment	Justification
			Outer Tralee Bay (IE_SH_040_0000)		Screened In	Potential for fuel, oil and concrete used in the construction of the proposed development to enter the waterbody accidentally due to proximity to the waterbody via run off or a spill event.
Operational	Discharge of wastewater from facilities	Groundwater	Brandon Head (IE_SH_G_044)	Discharge from facilities has the potential to negatively impact water quality.	Screened In	Discharge is to ground and therefore has the potential to impact water quality.
		Surface Water	Killiney River (Gowlane_10)		Screened Out	Discharge is downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works. No direct hydrological connection to the proposed development site.
			Lough Gill (IE_SH_23_72 and IE_SH_040_0100)		Screened Out	Discharge is downgradient from surface water body reducing the chance of a negative impact occurring due to the proposed works. No direct hydrological connection to the proposed development site.
			Outer Tralee Bay (IE_SH_040_0000)		Screened In	Discharge is to ground. The groundwater underlying the percolation site fluctuates with the tides due to its proximity The percolated tertiary treated effluent therefore will meet and mix with this saline water. Therefore, there is potential to impact water quality locally.

## 6.2 Stage Two: Scoping

A Stage 2 Scoping Assessment is required as the Brandon Head GWB and the Outer Tralee Bay coastal waterbody have been determined to 'Screen In' for the scoping Assessment based on the probability of an impact occurring due to the associated works for the Proposed Development. The aim of the scoping stage is to identify receptors within the water bodies brought forward which may be impacted. These receptors include:

- Hydromorphology,
- Habitats,
- Fish Species,
- Water Quality,
- Protected Areas.

The scoping assessment was undertaken, and the results are presented in **Table 6-3**. For the Brandon Head GWB, Hydromorphology, water quality and protected areas are the only identified relevant receptors. The remaining receptors were excluded.

**Table 6-3: Results of Scoping Exercise**

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Scoped for Impact Assessment	Rational /Justification
Construction	Site clearing and excavation	Groundwater	Brandon Head (IE_SH_G_044)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the GWB.
				Water Quality	Yes	Potential from the excavation for material to enter the waterbodies, particularly during periods of heavy rainfall.
				Protected Areas	Yes	The Proposed Development occurs over the Brandon Head GWB, which is designated for Drinking Water Abstraction under Article 7 of the WFD.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the surface waterbody.
				Habitats	Yes	Potential for site run-off to enter the water body and negatively affect habitats.
				Fish	Yes	Potential for site run-off to enter the water body and negatively affect fish species.
				Water Quality	Yes	Potential for site run-off to enter the water body and negatively affect water quality.
				Protected Areas	Yes	Potential for site run-off to enter the water body and negatively affect Protected Areas such as Natura 2000 sites and the Designated Shellfish Waters located in the Bay.
		Construction		Groundwater	Brandon Head (IE_SH_G_044)	Hydromorphology

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Scoped for Impact Assessment	Rational /Justification
	Demolition of Concrete Apron and removal of existing septic tank			Water Quality	Yes	Potential for demolition material to enter the GWB during construction works.
				Protected Areas	Yes	The Proposed Development occurs over the Brandon Head GWB, which is designated for Drinking Water Abstraction under Article 7 of the WFD.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the surface waterbody.
				Habitats	Yes	Potential for debris and site run-off to enter the water body and negatively affect habitats.
				Fish	Yes	Potential for debris and site run-off to enter the water body and negatively affect fish species.
				Water Quality	Yes	Potential for debris and site run-off to enter the water body and negatively affect water quality.
Protected Areas	Yes	Potential for debris and site run-off to enter the water body and negatively affect Protected Areas such as Natura 2000 sites and the Designated Shellfish Waters located in the Bay.				
Construction	Construction of Wastewater treatment system	Groundwater	Brandon Head (IE_SH_G_044)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the GWB.
				Water Quality	Yes	Potential from the excavation and installation for material to enter the waterbodies, particularly during periods of heavy rainfall
				Protected Areas	Yes	The Proposed Development occurs over the Brandon Head GWB, which is designated for Drinking Water Abstraction under Article 7 of the WFD

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Scoped for Impact Assessment	Rational /Justification
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the surface waterbody.
				Habitats	Yes	Potential for material and site run-off to enter the water body and negatively affect habitats.
				Fish	Yes	Potential for material and site run-off to enter the water body and negatively affect fish species.
				Water Quality	Yes	Potential for material and site run-off to enter the water body and negatively affect water quality.
				Protected Areas	Yes	Potential for material and site run-off to enter the water body and negatively affect Protected Areas such as Natura 2000 sites and the Designated Shellfish Waters located in the Bay.
Construction	Northern Slope Beach Universal Access and Ramp Improvement	Groundwater	Brandon Head (IE_SH_G_044)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the GWB.
				Water Quality	Yes	Potential from the upgrade works for material to enter the waterbodies, particularly during periods of heavy rainfall
				Protected Areas	Yes	The Proposed Development occurs over the Brandon Head GWB, which is designated for Drinking Water Abstraction under Article 7 of the WFD.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the surface waterbody.
				Habitats	Yes	Closest point of works to Tralee Bay. Potential for material and site run-off from the improvement works to enter the water body and negatively affect habitats.

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Scoped for Impact Assessment	Rational /Justification
				Fish	Yes	Closest point of works to Tralee Bay. Potential for material and site run-off from the improvement works to enter the water body and negatively affect fish species.
				Water Quality	Yes	Closest point of works to Tralee Bay. Potential for material and site run-off from the improvement works to enter the water body and negatively affect water quality.
				Protected Areas	Yes	Closest point of works to Tralee Bay. Potential for material and site run-off from the improvement works to enter the water body and negatively affect Protected Areas such as Natura 2000 sites and the Designated Shellfish Waters located in the Bay.
Construction	Construction of building and public realm works	Groundwater	Brandon Head (IE_SH_G_044)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the GWB.
				Water Quality	Yes	Potential from the construction works for material to enter the waterbodies, particularly during periods of heavy rainfall.
				Protected Areas	Yes	The Proposed Development occurs over the Brandon Head GWB, which is designated for Drinking Water Abstraction under Article 7 of the WFD.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the surface waterbody.
				Habitats	Yes	Potential for material and site run-off to enter the water body and negatively affect habitats.
				Fish	Yes	Potential for material and site run-off to enter the water body and negatively affect fish species.
				Water Quality	Yes	Potential for material and site run-off to enter the water body and negatively affect water quality.

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Scoped for Impact Assessment	Rational /Justification
				Protected Areas	Yes	Potential for material and site run-off to enter the water body and negatively affect Protected Areas such as Natura 2000 sites and the Designated Shellfish Waters located in the Bay.
Construction	Use of fuels, oils and concrete on site	Groundwater	Brandon Head (IE_SH_G_044)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the GWB.
				Water Quality	Yes	Potential for site run-off from construction or spill events to penetrate the soils and enter the GWB.
				Protected Areas	Yes	The Proposed Development occurs over the Brandon Head GWB, which is designated for Drinking Water Abstraction under Article 7 of the WFD.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Hydromorphology	No	The works and activities for the Proposed Development will not alter the Hydromorphology of the surface waterbody.
				Habitats	Yes	Potential for site run-off to enter the water body and negatively affect habitats.
				Fish	Yes	Potential for site run-off to enter the water body and negatively affect fish species.
				Water Quality	Yes	Potential for site run-off to enter the water body and negatively affect water quality.
				Protected Areas	Yes	Potential for site run-off to enter the water body and negatively affect Protected Areas such as Natura 2000 sites and the Designated Shellfish Waters located in the Bay.
		Operational		Groundwater	Brandon Head (IE_SH_G_044)	Hydromorphology

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Scoped for Impact Assessment	Rational /Justification
	Discharge of wastewater from facilities			Water Quality	Yes	As the system discharges to the ground there is potential to impact water quality in the GWB.
				Protected Areas	Yes	The Proposed Development occurs over the Brandon Head GWB, which is designated for Drinking Water Abstraction under Article 7 of the WFD.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Hydromorphology	No	The operational phase of the Proposed Development will not alter the Hydromorphology of the surface water body.
				Habitats	Yes	As the system discharges to the ground there is potential to impact habitats in the Bay given the proximity.
				Fish	Yes	As the system discharges to the ground there is potential to impact fish species in the Bay given the proximity.
				Water Quality	Yes	As the system discharges to the ground there is potential to impact water quality in the Bay given the proximity.
				Protected Areas	Yes	As the system discharges to the ground there is potential to impact Protected Areas such as Natura 2000 sites and the Designated Shellfish Waters located in the Bay given the proximity.

### 6.3 Stage Three: Impact Assessment

The purpose of a Stage 3 impact assessment is to determine whether the Proposed Development and its activities would inhibit the identified waterbodies from achieving 'Good' status as outline in the WFD. This can be due to deterioration of the current ecological and/or chemical status of the waterbodies or impacts on water quality and the identified water dependant species and habitats that are present in the relevant waterbodies.

The assessment draws on the relevant information concerning the design and implementation proposals for the proposed development and the WFD baseline data from the data collation stage.

The results of the impact assessment exercise are set out in **Table 6-4**.

Table 6-4: Impact Assessment Exercise

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
Construction	Site clearing and excavation	Groundwater	Brandon Head (IE_SH_G_044)	Water Quality	No	Any groundwater seepage flowing out of permanent cutting faces will be directed to receiving drainage system by the installation of slope drains, drainage blankets and counterfort drains. No works will take place during adverse weather conditions to minimise potential run-off of excavated materials. Best practice guidelines will also be followed during the site clearing and excavation to prevent impact on water quality, protecting the current 'Good' Status of the GWB.
				Protected Areas	No	Any groundwater seepage flowing out of permanent cutting faces will be directed to receiving drainage system by the installation of slope drains, drainage blankets and counterfort drains. Best practice guidelines will also be followed during the site clearing and excavation to prevent impact on protected areas, in this case designation under Article 7 of the WFD for Drinking Water Abstraction.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Habitats	No	No works will take place during adverse weather conditions to minimise potential run-off of excavated materials. Silt traps on existing site drainage system to prevent interaction with waterbodies will be used, which will protect the associated water dependant habitats. Best practice guidelines will also be followed during the site clearing and excavation to prevent impacts on habitats, protecting the 'Good' status of the surface waterbody.
				Fish	No	No works will take place during adverse weather conditions to minimise potential run-off of excavated materials. Silt traps on existing site drainage system to prevent interaction with waterbodies will be used, which will protect the associated fish species. Best practice guidelines will also be followed during the site clearing and excavation to prevent impacts on fish species, protecting the 'Good' status of the surface waterbody.

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
				Water Quality	No	No works will take place during adverse weather conditions to minimise potential run-off of excavated materials. Silt traps on existing site drainage system to prevent interaction with waterbodies will be used, which will protect water quality. Best practice guidelines will also be followed during the site clearing and excavation to prevent impacts on water quality, protecting the 'Good' status of the surface waterbody.
				Protected Areas	No	No works will take place during adverse weather conditions to minimise potential run-off of excavated materials. Best practice guidelines will also be followed during the site clearing and excavation to protect the 'Good' status of the surface waterbody and prevent impacts on Protected Areas such as the Natura 2000 sites and their Qualifying Interests, Designated Shellfish Waters, and Bathing Water.
Construction	Demolition of Concrete Apron and removal of existing septic tank	Groundwater	Brandon Head (IE_SH_G_044)	Water Quality	No	Demolition and removal works will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions, and the septic tank will be emptied by a licensed contractor prior to removal, reducing the risk of leakage or spill into the GWB and negatively affecting its 'Good' status.
				Protected Areas	No	Demolition and removal works will be monitored and follow best practice guidelines to reduce the risk of impacts to the Article 7 Designated Drinking Water Abstraction area that is the GWB. Works will also not take place in adverse weather conditions, and the septic tank will be emptied by a licensed contractor prior to removal, reduce the risk of leakage or spill into the GWB. It is therefore considered that there would not be a negative impact to the 'Good' status of the GWB.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Habitats	No	Demolition and removal works will be monitored and follow best practice guidelines to reduce the risk of impacts to habitats from site run-off. Works will also not take place in adverse weather conditions, and the

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
						sceptic tank will be emptied by a licensed contractor prior to removal, reducing the risk of leakage or spill that may enter the surface water body and negatively affecting its water dependant habitats and 'Good' ecological status.
				Fish	No	Demolition and removal works will be monitored and follow best practice guidelines to reduce the risk of impacts to fish species from site run-off. Works will also not take place in adverse weather conditions, and the sceptic tank will be emptied by a licensed contractor prior to removal, reducing the risk of leakage or spill that may enter the surface water body and negatively affecting its fish species and 'Good' ecological status.
				Water Quality	No	Demolition and removal works will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality from site run-off. Works will also not take place in adverse weather conditions, and the sceptic tank will be emptied by a licensed contractor prior to removal, reducing the risk of leakage or spill that may enter the surface water body and negatively affecting its water quality and 'Good' ecological status.
				Protected Areas	No	Demolition and removal works will be monitored and follow best practice guidelines to reduce the risk of impacts to protected areas from site run-off. Works will also not take place in adverse weather conditions, and the sceptic tank will be emptied by a licensed contractor prior to removal, reducing the risk of leakage or spill that may enter the protected areas in the vicinity, such as the Natura 2000 sites, Bathing Waters and the Designated Shellfish Waters, and negatively affecting its 'Good' ecological status.
Construction	Construction of Wastewater treatment system	Groundwater	Brandon Head (IE_SH_G_044)	Water Quality	No	Construction works and installation of the new wastewater treatment system will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
						potential infiltration of the GWB, reducing the risk of negatively affecting its 'Good' status.
				Protected Areas	No	Construction works and installation of the new wastewater treatment system will be monitored and follow best practice guidelines to reduce the risk of impacts to the Article 7 Designated Drinking Water Abstraction area. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the GWB. Therefore it is not anticipated there would not be a negative impact to the 'Good' status of the GWB.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Habitats	No	Construction works and installation of the new wastewater treatment system will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body and the water dependant habitats within, protecting these habitats and maintaining the 'Good' ecological status.
				Fish	No	Construction works and installation of the new wastewater treatment system will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body and the fish species within, protecting these fish species and maintaining the 'Good' ecological status.
				Water Quality	No	Construction works and installation of the new wastewater treatment system will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
						potential infiltration of the surface water body and negatively impacting the water quality, maintaining the 'Good' status.
				Protected Areas	No	Construction works and installation of the new wastewater treatment system will be monitored and follow best practice guidelines to reduce the risk of impacts to protected areas in the vicinity, such as Natura 2000 sites Bathing Waters and Designated Shellfish Waters. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body and negatively impacting the protected areas, maintaining the 'Good' ecological status for these protected areas.
Construction	Northern Slope Beach Universal Access and Ramp Improvement	Groundwater	Brandon Head (IE_SH_G_044)	Water Quality	No	Improvement works to the northern beach access will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the GWB, reducing the risk of negatively affecting its 'Good' status.
				Protected Areas	No	Improvement works to the northern beach access will be monitored and follow best practice guidelines to reduce the risk of impacts to the Article 7 Designated Drinking Water Abstraction area that is the GWB. Works will also not take place in adverse weather conditions. Therefore it is not anticipated there would not be a negative impact to the 'Good' status of the GWB.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Habitats	No	Improvement works to the northern beach access will be monitored and follow best practice guidelines to reduce the risk of impacts to water dependant habitats. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body and the water dependant habitats within, protecting these habitats and maintaining the 'Good' ecological status.

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
				Fish	No	Improvement works to the northern beach access will be monitored and follow best practice guidelines to reduce the risk of impacts to fish species in the surface waterbody. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body and negatively impacting fish species within, protecting these fish species and maintaining the 'Good' ecological status.
				Water Quality	No	Improvement works to the northern beach access will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body and the water dependant habitats within, protecting these habitats and maintaining the 'Good' ecological status.
				Protected Areas	No	Improvement works to the northern beach access will be monitored and follow best practice guidelines to reduce the risk of impacts to protected sites in the vicinity, such as Natura 2000 sites, Bathing Waters and Designated Shellfish Waters. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body and the associated protected areas within, protecting these areas and their Qualifying Interests, and maintaining the 'Good' ecological status.
Construction	Construction of building and public realm works	Groundwater	Brandon Head (IE_SH_G_044)	Water Quality	No	Construction works of the community shared facilities and public realm will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the GWB, reducing the risk of negatively affecting its 'Good' status.

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
				Protected Areas	No	Construction works of the community shared facilities and public realm will be monitored and follow best practice guidelines to reduce the risk of impacts to the Article 7 Designated Drinking Water Abstraction area that is the GWB. Works will also not take place in adverse weather conditions. Therefore it is considered that there would not be a negative impact to the 'Good' status of the GWB.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Habitats	No	Construction works of the community shared facilities and public realm will be monitored and follow best practice guidelines to reduce the risk of impacts on habitats in the surface water body. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body, reducing the risk of negatively affecting its 'Good' ecological status.
				Fish	No	Construction works of the community shared facilities and public realm will be monitored and follow best practice guidelines to reduce the risk of impacts on fish species in the surface water body. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body, reducing the risk of negatively affecting its 'Good' ecological status.
				Water Quality	No	Construction works of the community shared facilities and public realm will be monitored and follow best practice guidelines to reduce the risk of impacts to water quality. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body, reducing the risk of negatively affecting its 'Good' status.
				Protected Areas	No	Construction works of the community shared facilities and public realm will be monitored and follow best practice guidelines to reduce the risk of impacts to protected sites in the vicinity, such as Natura 2000 sites,

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
						Bathing Waters and Designated Shellfish Waters. Works will also not take place in adverse weather conditions. Silt traps and drainage will be managed to prevent potential infiltration of the surface water body and the associated protected areas within, protecting these areas and their Qualifying Interests, and maintaining the 'Good' ecological status.
Construction	Use of fuels, oils and concrete on site	Groundwater	Brandon Head (IE_SH_G_044)	Water Quality	No	Fuels and oils will be stored in bunded areas. Fuelling will only occur in a designated fuelling area to reduce the potential for spills. Spill kits will be available around the site and will be made known to personnel during induction. Concrete pouring will not be undertaken during periods of rainfall to prevent possible run-off infiltrating the GWB and affecting water quality. Emergency procedures will also be in place in the event of a spill to minimise impact and maintain the 'Good' status of the GWB.
				Protected Areas	No	Fuels and oils will be stored in bunded areas. Fuelling will only occur in a designated fuelling area to reduce the potential for spills. Spill kits will be available around the site and will be made known to personnel during induction. Concrete pouring will not be undertaken during periods of rainfall to prevent possible run-off infiltrating the GWB and affecting the Article 7 Designated Drinking Water Abstraction Area. Emergency procedures will also be in place in the event of a spill to minimise impact.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Habitats	No	Fuels and oils will be stored in bunded areas. Fuelling will only occur in a designated fuelling area to reduce the potential for spills. Spill kits will be available around the site and will be made known to personnel during induction. Concrete pouring will not be undertaken during periods of rainfall to prevent possible run-off infiltrating the surface water body and affecting habitats within. Emergency procedures will also be in place in the event of a spill to minimise impact and maintain the 'Good' ecological status of the surface water body.

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
				Fish	No	Fuels and oils will be stored in bunded areas. Fuelling will only occur in a designated fuelling area to reduce the potential for spills. Spill kits will be available around the site and will be made known to personnel during induction. Concrete pouring will not be undertaken during periods of rainfall to prevent possible run-off infiltrating the surface water body and affecting fish species within. Emergency procedures will also be in place in the event of a spill to minimise impact and maintain the 'Good' ecological status of the surface water body.
				Water Quality	No	Fuels and oils will be stored in bunded areas. Fuelling will only occur in a designated fuelling area to reduce the potential for spills. Spill kits will be available around the site and will be made known to personnel during induction. Concrete pouring will not be undertaken during periods of rainfall to prevent possible run-off infiltrating the surface water body and affecting water quality. Emergency procedures will also be in place in the event of a spill to minimise impact and maintain the 'Good' status of the surface water body.
				Protected Areas	No	Fuels and oils will be stored in bunded areas. Fuelling will only occur in a designated fuelling area to reduce the potential for spills. Spill kits will be available around the site and will be made known to personnel during induction. Concrete pouring will not be undertaken during periods of rainfall to prevent possible run-off infiltrating the surface water body and affecting protected areas within, such as Natura 2000 sites, Bathing Waters and Designated Shellfish Waters. Emergency procedures will also be in place in the event of a spill to minimise impact and maintain the 'Good' ecological status of the surface water body.
Operational		Groundwater	Brandon Head (IE_SH_G_044)	Water Quality	No	Wastewater that is discharged from the facility will go through a Primary, Secondary, and Tertiary treatment before being released. The expected daily discharge volume is estimated to be approximately 3.7m <sup>3</sup> and will be

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
	Discharge of wastewater from facilities					treat to the acceptable level for discharges of wastewater, as per Table 4.2 of the EPA Code of Practice: Domestic Wastewater Treatment Systems 2021. The treated effluent surpasses the minimum performance standards required for discharge and thus negating the impact on water quality and maintaining the 'Good' status on the GWB.
				Protected Areas	No	Wastewater that is discharged from the facility will go through a Primary, Secondary, and Tertiary treatment before being released. The expected discharge is estimated to be 3.7m <sup>3</sup> and will be treated to the acceptable level for discharges of wastewater, as per Table 4.2 of the EPA Code of Practice: Domestic Wastewater Treatment Systems 2021. The treated effluent surpasses the minimum performance standards required for discharge and thus negating the impact on the Designated Drinking Water Abstraction Area under Article 7 of the WFD.
		Surface Water	Outer Tralee Bay (IE_SH_040_0000)	Habitats	No	Wastewater that is discharged from the facility will go through a Primary, Secondary, and Tertiary treatment before being released. The three process treatment and ensures no discharge directly into the surface waterbody.  The expected discharge is estimated to be 3.7m <sup>3</sup> and will be treated to the acceptable level for discharges of wastewater, as per Table 4.2 of the EPA Code of Practice: Domestic Wastewater Treatment Systems 2021. The treated effluent surpasses the minimum performance standards required for discharge and will negate the impact on habitats and maintain the 'Good' ecological status on the surface water body.
				Fish	No	Wastewater that is discharged from the facility will go through a Primary, Secondary, and Tertiary treatment before being released. The three process treatment and ensures no discharge directly into the surface waterbody.  The expected discharge is estimated to be 3.7m <sup>3</sup> and will be treated to the acceptable level for discharges of wastewater, as per Table 4.2 of the EPA Code of Practice: Domestic Wastewater Treatment Systems 2021. The

Phase	Activity	Water Resource	Water Body Name and ID Number	Receptors	Will activity hinder reaching or maintaining 'Good' Status?	Rational /Justification
						treated effluent surpasses the minimum performance standards required for discharge and will negate the impact on fish and maintain the 'Good' ecological status on the surface water body.
				Water Quality	No	<p>Wastewater that is discharged from the facility will go through a Primary, Secondary, and Tertiary treatment before being released. The three process treatment and ensures no discharge directly into the surface waterbody.</p> <p>The expected discharge is estimated to be 3.7m<sup>3</sup> and will be treated to the acceptable level for discharges of wastewater, as per Table 4.2 of the EPA Code of Practice: Domestic Wastewater Treatment Systems 2021. The treated effluent surpasses the minimum performance standards required for discharge and will negate the impact on water quality and maintain the 'Good' status on the surface water body.</p>
				Protected Areas	No	<p>Wastewater that is discharged from the facility will go through a Primary, Secondary, and Tertiary treatment before being released. The three process treatment and ensures no discharge directly into the surface waterbody.</p> <p>The expected discharge is estimated to be 3.7m<sup>3</sup> and will be treated to the acceptable level for discharges of wastewater, as per Table 4.2 of the EPA Code of Practice: Domestic Wastewater Treatment Systems 2021. The treated effluent surpasses the minimum performance standards required for discharge and will negate the impact on Protected Areas such as Natura 2000 sites, Designated Shellfish Waters and bathing waters, and maintain the 'Good' ecological status on the surface water body.</p>

## 7. Conclusion

This WFD compliance assessment has been undertaken for the Maherabeg Beach Facility Centre Project.

The key focus of the assessment was to ensure that the construction and operation of the Project does not result in a deterioration in the current WFD status of the water bodies within the WFD study area, and also to ensure that the project does not compromise the achievement of the WFD objectives for the improvement in the overall status of these water bodies. The assessment also considers the protected areas linked to the water bodies in question and ensures that the protected area objectives are also unaffected.

The scoping stage of the WFD compliance assessment has concluded that there were a number of components and activities associated with the Project that represented a risk to the WFD status and objectives and therefore were scoped into the assessment. The relevant quality elements contributing to the overall status were considered and how each potential impact could affect these. Mitigation measures included within the Project design and the application of best practice mitigation measures will ensure that there will be no significance effects on the WFD status of the water bodies within the study area. The overall conclusion of this WFD compliance assessment is that there will be no risk of deterioration in status from the Project nor will it prevent of the achievement of the objectives for the relevant water bodies including the protected area objectives.