

## Seed mussel fishing and relaying on Castlemaine Harbour SAC and SPA: Variation to the Fishery Natura Plan 2016-2026

## Screening for appropriate assessment

September 2019

Marine Institute Rinville Oranmore

### Section 1 - Introduction

An appropriate assessment of a Fishery Natura Plan (FNP) for seed mussel in Castlemaine Harbour was completed in 2016. The FNP was developed by the industry in Castlemaine Harbour based on the known location of seed mussel settlements at the time. Annual surveys of seed mussel beds in the area are undertaken by BIM. These surveys are integral to the FNP in that they inform the industry of the biomass and spatial distribution of seed mussel settlement each year.

The fishery operates under a series of harvest control rules which take into account the results of the survey. Harvest control rules include

- A total allowable catch of 66% of the survey biomass.
- Spatial limits on the distribution of fishing including
  - i. Areas where there is infrequent settlement of seed
  - ii. Areas which are unsuitable for fishing

In addition, there are licencing restrictions and monitoring and control programmes in place which limit inputs and prevent escalation in fishing effort.

Seed taken from the sub-tidal seed bed is relayed to an intertidal nursery for approximately 18 months and re-laid again sub-tidally in the main channel of the Harbour for on growing to market size. This full grown mussel is then dredged and landed for sale for human consumption.

A modification to the FNP 2016-2026 was submitted to DAFM in 2019. This report is a screening for appropriate assessment of the proposed changes to the plan under regulation 4 of SI 290/2013

### Section 2 - Modification of the 2016-2026 FNP

A request to modify the FNP of 2016 was submitted to DAFM in September 2019. The modification is to change the location of fishing which would then encroach onto a no fishing zone described in the original FNP. This is because of changes in the location of seed mussel settlement in the area.

The variation is relevant only to the harvest control rule which limits the locations in which fishing for seed can occur. As described in the variation request changes to the seabed, caused by winter storms, resulted in shifts in the location of sediments suitable for seed mussel settlement into areas described in the FNP 2016-2026 as unsuitable for fishing (Figure 1). The variation request does not propose any other changes regarding the level of fishing activity, the overall distribution or footprint of the fishery or any other changes to the operation of the fishery, relay or harvesting operations described in the

## Screening report regarding variation request to the Castlemaine Harbour mussel seed fishery Natura plan 2016-2026

FNP 2016-2026.

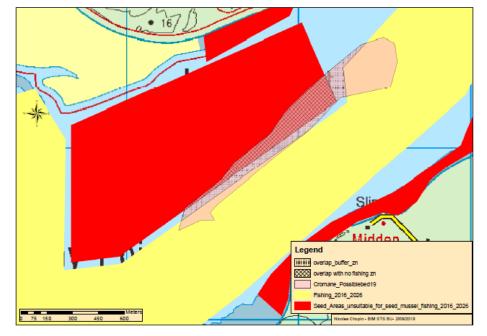


Figure 1. The seed mussel bed surveyed in 2019 showing overlap with areas which were classed as no

fishing zones (red) in the 2016-2026 FNP.

#### Section 3 - Screening report

The 2016-2026 FNP described the variability in the annual location of seed beds and that changes may need to be notified annually depending on local conditions. The mussel seed bed in 2019 partly falls within an area classed as a no fishing zone in the 2016-2026 FNP. The 2019 seed bed overlaps with 8.4ha of the no fishing zone. The total area of the 2019 seed bed is 25.3ha.

The reason for classifying a no fishing zone in the original FNP was not due to sensitivity of habitats in that zone to fishing but simply because the area was deemed unsuitable for fishing owing to the presence of substrate on which it was not possible to dredge.

The no fishing zone, the known locations of historic seed beds and the 2019 seed bed are all in areas classified as mixed sediment community complex (Figure 2). The area of the 2019 seed bed is at the lower end of the historic range and represents a 3.5% overlap with the mixed sediment community complex (Table 1).

As the 2019 seed bed does not encroach on habitats other than that described in the original FNP, and in the Appropriate Assessment (2016) of the FNP, and as the total area of the seed bed and proposed fishery is within the range already assessed in 2016 the proposed modification of the FNP does not represent a significant material change in the conditions under which any fishery in 2019 would

# Screening report regarding variation request to the Castlemaine Harbour mussel seed fishery Natura plan 2016-2026

operate.

Year	Seed area (ha)	%overlap with mixed sediments	
2009	32	3.99	
2010	44	5.49	
2011	26	3.24	
2012	31	3.87	
2013	101	12.59	
2014	76	9.48	
2015	128	15.96	
2019	25	3.2	

#### Table 1. Geographic area of seed mussel beds 2009-2019 and % overlap with mixed sediments

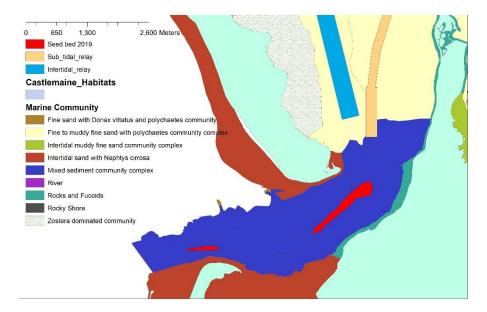


Figure 2. Marine Communities at the western edge of the Castlemaine Harbour SAC and the location of the 2019 seed bed.

### Section 4 - Recommendation

An appropriate assessment was completed in 2016 for the 2016-2026 FNP for seed mussel fisheries in Castlemaine Harbour. The proposed modification of the FNP in 2019 does not represent a significant material change to the plan and an appropriate assessment of the proposed modification is not necessary.

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