THERAPEUTANT RESIDUE MONITORING SCHEDULE – MARINE FARMING LEASE NO. 94 (THE SHEPPARDS) – FEBRUARY 2026

1. General Requirements

A Therapeutant Residue Monitoring Program must be conducted with respect to the finfish farming activity undertaken by Aquatas Pty Ltd (Tassal) on Marine Farming Lease No. 94 (The Sheppards) (MF94) under Environmental Licence No. 9869/5 ('the EL').

The Therapeutant Residue Monitoring Program must be conducted in accordance with the specifications in this schedule or as otherwise specified in writing by the Director. The specifications in this schedule may be reviewed and amended based on monitoring results and any other additional information received.

This monitoring schedule has been developed to assess potential environmental impacts from this medication event and is based on the information provided in the Veterinary Authority (VA) '26-Tx-M04', the environment in which the lease is located, previous treatment history, and research into the active ingredient and its potential environmental fate.

All samples for a scheduled sampling event must be collected on the same day to the extent practical, or otherwise over consecutive days. If a scheduled sampling event coincides with a weekend or public holiday, samples must be taken on the scheduled date or the day immediately before or after the scheduled date.

Any survey, sample or measurement required in this schedule must be taken, processed and analysed in accordance with the following:

- surveying, sampling and measuring must be undertaken by a person with appropriate training, experience, and knowledge of the relevant procedure.
- the integrity of samples must be preserved prior to delivery to a testing facility.
- sample analysis must be conducted by a testing facility accredited by the National Association of Testing Authorities (NATA), or a testing facility approved in writing by the Director, for the specified test.
- sample analysis must be conducted for the nominated therapeutant in accordance with the Limits of Reporting (LoRs) listed for each analyte and sample matrix listed in Table 1 of this schedule.
- details of methods employed in taking samples and measurements and results of sample analysis and measurements must be retained for at least three (3) years after the date of collection.

Table 1. Required limit of reporting (LoRs)

	Sample Matrix		
Analyte	**Water (µg/L)**	**Sediment/Solid (mg/Kg)**	**Fish/Tissue (mg/Kg)**
Florfenicol	0.1	0.005	-
Florfenicol-amine	0.1	0.01	-
Sum of Florfenicol and its metabolites measured as Florfenicol-amine	-	-	0.01

The Therapeutant Residue Monitoring Program includes the following components:

2.1 Benthic Video Surveys
2.2 Sediment Sampling
2.3 Wild Fish Sampling
2.4 Water Sampling
2.5 Reporting of Results

Maps of the approximate locations of internal, external and reference sites are provided in Attachment 1.

A table summarising all monitoring requirements and dates is provided in Attachment 2.

Interim and final report requirements is provided in Attachment 3.

All sampling requirements have been included in the relevant sampling tables of this monitoring schedule.

Any alterations to the proposed therapeutant treatment event which results in the extension of the treatment period, multiple treatments or an increase in the magnitude of the proposed treatment may result in the amendment of the residue monitoring schedule in order to assess the potential impact of the alteration.

2. Therapeutant Residue Monitoring Program Specifications

2.1 Benthic Video Surveys

Survey Sites and Days:

Benthic video surveys must be conducted in accordance with the sites listed in Table 2 and the benthic video survey conditions of the EL.

In accordance with condition 3V6 of the EL, all video footage, geospatial files and the tabulated observations for each site are to be provided to the EPA within one month of conducting the required benthic video surveys.

Table 2. Benthic video survey sites and days

Site Category	Easting	Northing	Survey Days
MF94 Internal sites: All treated pen bays: 14,16,19	To be provided with survey results	To be provided with survey results	Prior to treatment* Day 1 post-treatment

*Note: Benthic video surveys prior to treatment have already been conducted, see Attachment 2 of this schedule.

2.2 Sediment Sampling

Sampling Sites and Days:

Samples must be collected in accordance with Table 3 and the requirements of this schedule.

a) Internal (pen) sites:
Samples must be taken from two (2) internal (pen) sites on MF94.

Samples must be taken at the edge of the treated pen, downstream of prevailing water currents, and the position must be recorded at the time of collection.

b) External sites:
Samples must be taken at three (3) sites along three (3) transects on MF94.

The transects must be positioned at right angles to the marine farming lease boundary. The samples must be taken at points which are at a distance of 35, 100 and 500 metres from the marine farming lease boundary.

c) Reference site:
Samples must be taken at two (2) reference sites (BEMP Sites M2 and M3).

Table 3. Sediment sampling sites and days

Site Name	Site Category	Easting	Northing	Sampling Days
MF94 Pen Bay 14	Internal (treated pen)	To be provided with test results	To be provided with test results	Days 1, 7, and 21 post-treatment
MF94 Pen Bay 19	Internal (treated pen)	To be provided	To be provided	Days 1, 7, and 21 post-treatment

Site Name	Site Category	Easting	Northing	Sampling Days
		with test results	with test results	
MF94 Compliance Site CP1.1 (CP1.1 N35)	External (35m)	524651	5229347	Days 1, 7, and 21 post-treatment
MF94 Compliance Site CP1.1 + 100m (CP1.1 N100)	External (100m)	524658	5229412	Days 1, 7, and 21 post-treatment
MF94 Compliance Site CP1.1 + 500m (CP1.1 N500)	External (500m)	524702	5229809	Days 1, 7, and 21 post-treatment
MF94 Compliance Site CP3.1 (CP3.1 E35) (note: **(note: new CP for MF94)**	External (35m)	524790	5228910	Days 1, 7, and 21 post-treatment
MF94 Compliance Site CP3.1 + 100m (CP3.1 E100)	External (100m)	524854	5228902	Days 1, 7, and 21 post-treatment
MF94 Compliance Site CP3.1 + 500m (CP3.1 E500)	External (500m)	525251	5228853	Days 1, 7, and 21 post-treatment
MF94 Compliance Site CP2.2 (CP2.2 S35)	External (35m)	524601	5228499	Days 1, 7, and 21 post-treatment
MF94 Compliance Site CP2.2 + 100m (CP2.2 S100)	External (100m)	524584	5228438	Days 1, 7, and 21 post-treatment
MF94 Compliance Site CP2.2 + 500m (CP2.2 S500)	External (500m)	524477	5228053	Days 1, 7, and 21 post-treatment
BEMP Site M2	Reference	523535	5233037	Days 1, 7, and 21 post-treatment
BEMP Site M3	Reference	523752	5225263	Days 1, 7, and 21 post-treatment

Sites provided in Table 3 are approximate only and may be adjusted as necessary for practical reasons. Field personnel must use their best professional judgment on the day of sampling to adjust the sites. The actual sites for each sampling event must be recorded and included in the reports required under section 2.5 of this schedule.

Sample collection, processing and storage:

All sediment samples must be kept chilled upon collection. If the samples cannot be delivered to the laboratory for testing within 12 hours, they must be frozen.

Fresh, clean corers must be used at each site. If this is not possible, the corer is to be thoroughly cleaned and rinsed with seawater between each site, with samples taken from the sites furthest from the lease boundary first (i.e. reference sites, 500 m, 100 m, 35 m and then internal (treated pen) sites).

At each site, triplicate cores (50 mm internal diameter and 75 mm depth) must be taken. Duplicates for each site are to be composited and processed as one sample by the laboratory, with the third sample to be retained in frozen storage in the event that further analysis is required.

For each sample, the top 25 mm (surface) and subsequent 50 mm (bottom) must be processed as separate sub-samples. For the duplicate composited samples, the top 25 mm from two replicate cores must be combined into one jar. Similarly, the bottom 50 mm from the same two cores must be combined into a single jar. The third replicate core is also to be split into separate surface and bottom sub-samples prior to freezing to prevent migration of analyte(s) between sub-samples during storage.

Please note that, subject to prior approval from the EPA, any sediment sites returning results below the LoRs (specified in Table 1) for two consecutive sampling events may be discontinued. If

concentrations above the required LoRs are detected on day 21 post-treatment, then the monitoring program may be extended for those sites.

2.3 Wild Fish Sampling

Wild fish must be collected, processed and submitted for florfenicol analysis at an appropriate testing facility in accordance with the requirements in this section. Wild fish must be collected from external or internal sites within the specified zones. The approximate locations of each site are provided in Table 4 and shown in Attachment 1.

Wild fish are to be caught on days 1, 7 and 21 post-treatment. Depending on previous sample results and any proposed treatment of additional pens on MF94, the Director may notify in writing the requirement to collect wild fish 29 days post-treatment (i.e. the 500 degree-days date).

The degree days dates have been calculated using the bottom water temperatures recorded from samples collected by industry at BEMP site M3 (Upper Mid Channel) over the previous ten years (November 2015 – October 2025), which were then grouped and averaged for each month. The average bottom water temperature calculated was 17.9°C for February and 17.4°C for March. Using these figures, the 500 degree-days date has been calculated to be 25 March 2026, which equates to 29 days post-treatment.

All wild fish sampling and degree-day dates are provided in Attachment 2.

Please note: A permit must be obtained to take fish for sampling under the *Living Marine Resources Management Act 1995*. Permits can be organised through the Wild Fisheries Management Branch of NRE Tas (Fisheries Permits).

All fish caught must be collected in accordance with the requirements stated within the granted Fisheries Permit. The EPA does not specify a particular method of fishing. However, feed pellets must not be used to attract fish as their presence in the fish gut may affect interpretation of the results.

Table 4. Wild fish sampling sites and days

Site Name	Site Category	Easting	Northing	Sampling Days	Comment
MF94: Within lease area to 1 km from lease boundary, **particularly in the vicinity of Killora**	External	Refer to the geospatial files provided separately	Refer to the geospatial files provided separately	Days 1, 7 and 21 post-treatment	Collect 6 fish during each sampling event GPS location and species caught to be provided with test results.
1 to 3 km from MF94 lease boundary, **particularly in the vicinity of Killora, Tinderbox marine reserve, & Coningham**	External	Refer to the geospatial files provided separately	Refer to the geospatial files provided separately	Days 1, 7 and 21 post-treatment	Collect 6 fish during each sampling event GPS location and species caught to be provided with test results.

Site Name	Site Category	Easting	Northing	Sampling Days	Comment
BEMP Site M2	Reference	523535	5233037	Days 1, 7 and 21 post-treatment	Collect 6 fish during each sampling event GPS location and species caught to be provided with test results.
BEMP Site M3	Reference	523752	5225263	Days 1, 7 and 21 post-treatment	Collect 6 fish during each sampling event GPS location and species caught to be provided with test results.

Sample Collection and Processing

Wild fish samples must be collected from sites furthest from the lease first before moving inwards towards the sites/zones closest to the lease boundary. Six (6) fish must be collected from each site as listed in Table 4.

Ideally, the fish collected should consist of 50% pelagic and 50% benthic species, but in the event that only one species can be captured, then a minimum of the number of fish of that species, as specified in Table 4, must be caught and processed. (Note: Pooled fish samples are not required. Single fish samples are acceptable).

All sampling gear and sample preparation equipment used in the field must be thoroughly cleaned. Measures to minimise contamination risk from medicated pellets coming into contact with the blade should be implemented, such as using a separate blade/instrument when cutting the abdomen vs. checking for gut contents. Alternatively, if this is not possible, the knife blade is to be thoroughly cleaned between cuts.

The species, length and gut contents must be recorded for all fish collected and the GPS location of each capture recorded. The tail of the fish must be cut off posterior to the anus and bagged prior to investigation of the fish's gut contents.

Flesh samples from the tail of the fish with pellets in their gut and from fish with no pellets are to be retained in separate bags with appropriate labelling (date, location, species, length, gut content), chilled immediately and frozen as soon as practicable.

Laboratory-based processing of samples involves slicing a flesh sample off the tail section. The sample must be removed by filleting the flesh off the backbone, thereby limiting inclusion of the vertebrae in the sample. The flesh sample must have skin on and can include lateral/pin bones. The remaining tail section must be bagged and held in frozen storage in the event additional analyses are required.

The weight (g) of each fish sample must be recorded. (Where samples are pooled, details of each fish within each pooled batch must be recorded and reported).

Please note that, subject to prior approval from the EPA, if wild fish sampling returns results below the LoRs (specified in Table 1) for the day 7 sampling event, wild fish sampling may be discontinued. If

concentrations above the required LoRs are detected on day 21 post-treatment, then the monitoring program may be extended for those sites.

2.4 Water Sampling

Water samples are to be collected from three (3) depth strata: i) the surface (0.1 m below the surface); ii) 10 m below the surface; and iii) the bottom (2 m above the seabed), at three (3) internal (lease centroid/treated pens) and three (3) external (35m) sites at MF94 and two (2) reference sites (BEMP Sites M2 and M3). The approximate coordinates for each site are available in Table 5. The sampling dates are provided in Attachment 2.

Table 5: Water sampling sites

Site Name	Site Category	Easting	Northing	Sampling Day
MF94 Centroid	Internal (lease centroid)	524620	5228929	Days 1 and 7 post-treatment
MF94 Pen Bay 14	Internal (treated pen)	To be provided with test results	To be provided with test results	Days 1 and 7 post-treatment
MF94 Pen Bay 19	Internal (treated pen)	To be provided with test results	To be provided with test results	Days 1 and 7 post-treatment
MF94 Compliance Site CP1.1 (CP1.1 N35)	External (35m)	524651	5229347	Days 1 and 7 post-treatment
MF94 Compliance Site CP3.1 (CP3.1 E35) **(note: new CP for MF94)**	External (35m)	524790	5228910	Days 1 and 7 post-treatment
MF94 Compliance Site CP2.2 (CP2.2 S35)	External (35m)	524601	5228499	Days 1 and 7 post-treatment
BEMP Site M2	Reference	507993	5210571	Days 1 and 7 post-treatment
BEMP Site M3	Reference	505506	5194296	Days 1 and 7 post-treatment

Samples are to be collected in labelled 250 mL amber glass bottles provided by the testing facility, kept cool in a dark environment and should be frozen as soon as possible after collection unless they can be delivered to that facility within 12 hours of collection.

Samples must be collected using clean equipment and in a manner to avoid any contamination. Water samples must be taken from the sites furthest from the lease boundary first, moving towards the lease undergoing treatment with the internal sites being sampled last.

The sampler must ensure that any additional instructions provided by the testing laboratory regarding sampling methodology, handling and storage are to be observed. Any variations to, or inconsistencies between, this schedule and instructions from the testing facility must be discussed with the EPA prior to sample collection.

2.5 Reporting of Results

Laboratory Reports

All laboratory reports for this monitoring program must be submitted electronically to salmon.reg@epa.tas.gov.au within one (1) business day of receipt, following each sampling round.

Please note that laboratory reports may be provided to the responsible sections within the Department of Natural Resources and Environment Tasmania (NRE Tas) or the Department of Health for the purposes of decisions making within their remit.

Monitoring Reports

A final monitoring report must be submitted electronically to salmon.reg@epa.tas.gov.au no later than 4 weeks following the final sampling event, noting that the monitoring may be extended by the Director as described above.

An interim monitoring report may be required by the Director. If requested, the interim monitoring report must also be submitted electronically to salmon.reg@epa.tas.gov.au.

All monitoring results must be summarised, accompanied by a full analysis and graphical presentation of the data. The final and any interim monitoring reports must be prepared in accordance with the reporting requirements provided in Attachment 3.

Please note, the final and any interim monitoring reports submitted to the Director will be made publicly available on the EPA website following review and acceptance.

Attachment 1

INTERNAL, EXTERNAL AND REFERENCE SAMPLING SITES

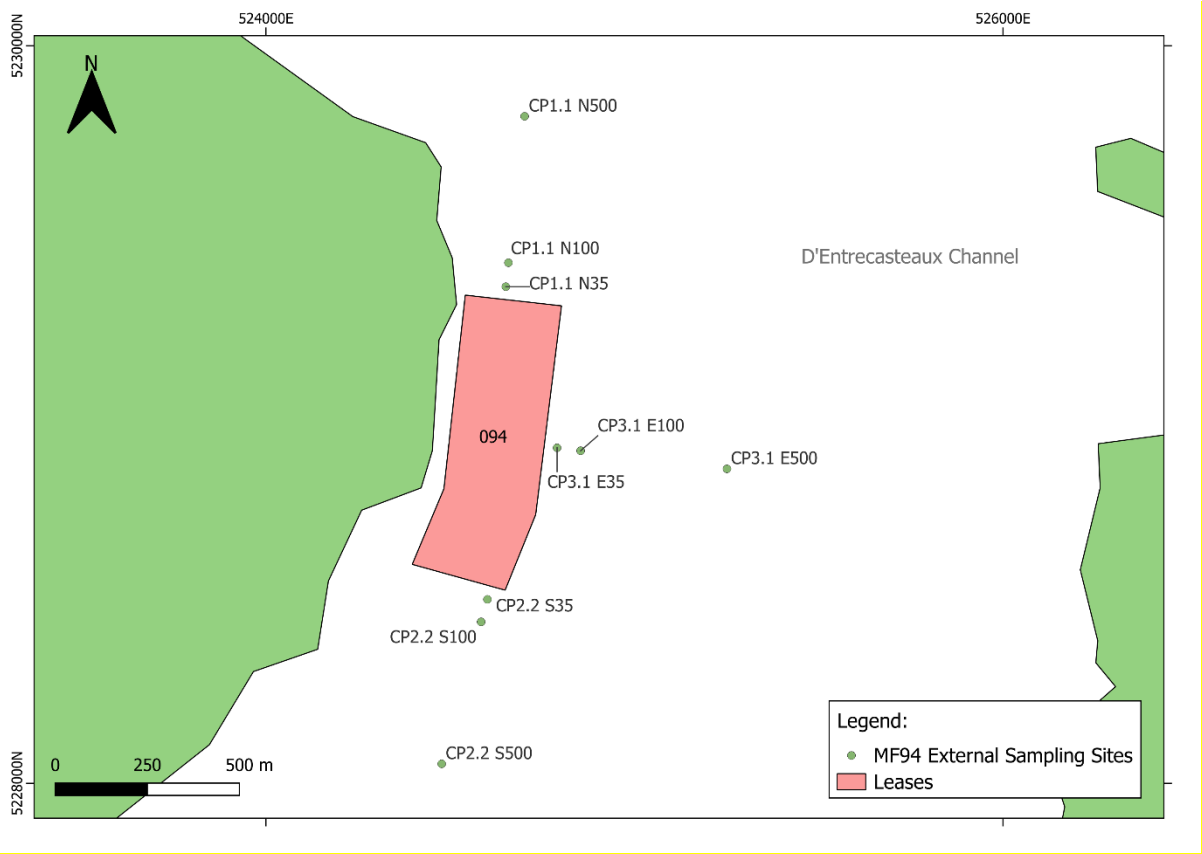

Figure 1. Map showing the locations of internal and external sites for sediment sampling and water sampling. Sediment and water samples must also be collected at pen bays 14 and 19.

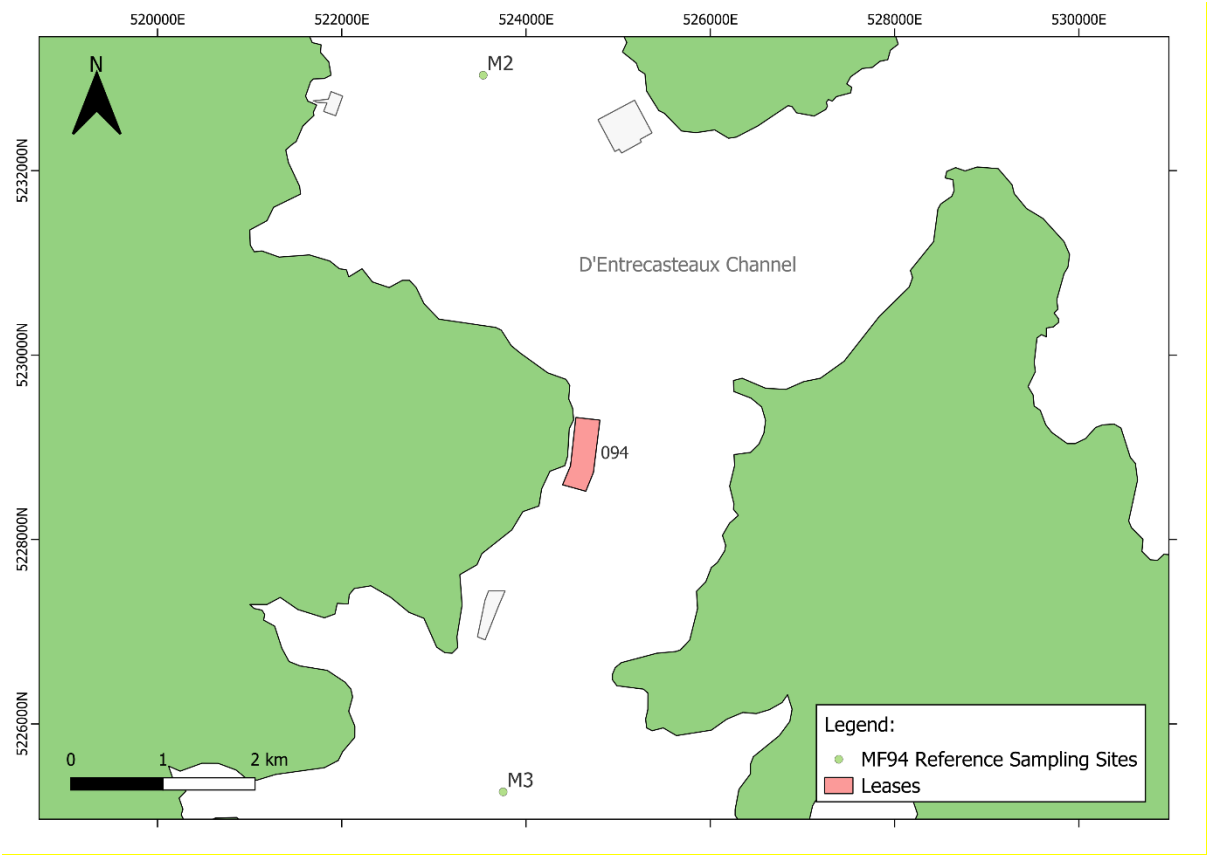

Figure 2. Map showing the locations of reference sites BEMP M2 and M3 for sediment and water sampling.

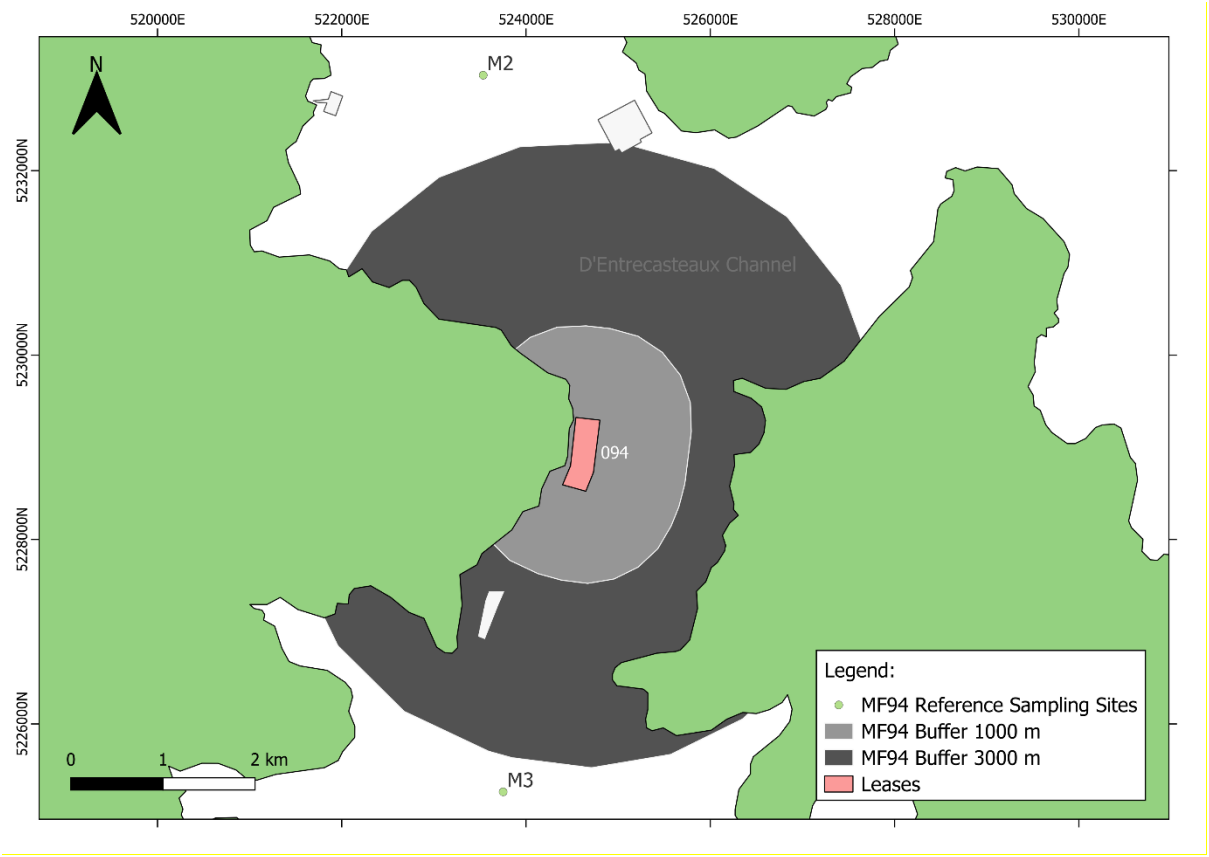

Figure 3. Map of wild fish sampling sites and zones for MF94 (The Sheppards)

Attachment 2

OVERVIEW OF SAMPLING PROGRAM ELEMENTS AND DATES - MF94 (THE SHEPPARDS)

Date	Day	Running Days	Benthic Video Surveys	Water Sampling	Sediment Sampling	Wild Fish Sampling
		Prior to Treatment*	X			
15/02/2026	Sunday	Treatment Day 1(Start)				
16/02/2026	Monday	Treatment Day 2				
17/02/2026	Tuesday	Treatment Day 3				
18/02/2026	Wednesday	Treatment Day 4				
19/02/2026	Thursday	Treatment Day 5				
20/02/2026	Friday	Treatment Day 6				
21/02/2026	Saturday	Treatment Day 7				
22/02/2026	Sunday	Treatment Day 8				
23/02/2026	Monday	Treatment Day 9				
24/02/2026	Tuesday	Treatment Day 10 (Finish)				
25/02/2026	Wednesday	Day 1 Post-Treatment	X	X	X	X
26/02/2026	Thursday	Day 2 Post-Treatment				
27/02/2026	Friday	Day 3 Post-Treatment				
28/02/2026	Saturday	Day 4 Post-Treatment				
01/03/2026	Sunday	Day 5 Post-Treatment				
02/03/2026	Monday	Day 6 Post-Treatment				
03/03/2026	Tuesday	Day 7 Post-Treatment		X	X	X
04/03/2026	Wednesday	Day 8 Post-Treatment				
05/03/2026	Thursday	Day 9 Post-Treatment				
06/03/2026	Friday	Day 10 Post-Treatment				
07/03/2026	Saturday	Day 11 Post-Treatment				
08/03/2026	Sunday	Day 12 Post-Treatment				
09/03/2026	Monday	Day 13 Post-Treatment				
10/03/2026	Tuesday	Day 14 Post-Treatment				
11/03/2026	Wednesday	Day 15 Post-Treatment				
12/03/2026	Thursday	Day 16 Post-Treatment				
13/03/2026	Friday	Day 17 Post-Treatment				
14/03/2026	Saturday	Day 18 Post-Treatment				
15/03/2026	Sunday	Day 19 Post-Treatment				
16/03/2026	Monday	Day 20 Post-Treatment				
17/03/2026	Tuesday	Day 21 Post-Treatment			X	X
25/03/2026	Wednesday	Day 29 Post-Treatment (500 Degree-Days)				
			Submit Final Monitoring Report 4 weeks after the final sampling event**			

* Note: Benthic video surveys prior to treatment have already been collected.

**This report submission date may be extended for a number of reasons, such as alterations to the treatment and subsequent amendments to the monitoring schedule, as well as any delays in receiving laboratory results.

Attachment 3

REPORT REQUIREMENTS

All monitoring reports must be submitted by the licence holder to the EPA by email to salmon.reg@epa.tas.gov.au in accordance with section 2.5 of this schedule. Once reviewed and accepted, these monitoring reports will be made publicly available on the EPA website.

Marine Farming Lease No: XXX

Environmental Licence No: XXXX/X

Licence Holder: XXX

Survey details: Dates of field work, sampling personnel, contact persons, testing facility(s) and contextual information regarding weather conditions and other relevant observations.

Treatment details: Treatment type, disease name, name of active ingredient, quantity (active ingredient) used, application method, commencement date and duration for each pen being treated.

Methods and results: The methods used for sample collection and analysis are to be described to allow verification that the requirements of this Monitoring Schedule have been met. The testing facility's Limits of Reporting for the required analyte(s) must be specified.

Benthic video surveys:
A description of the benthic video survey methodology, operational information and a summary of key observations must be provided. In addition, all survey site information (lease number, survey date, survey time, site name, site coordinates, depth) and observations for each benthic video survey are to be tabulated and a map showing all survey sites must be included.

Sediment sampling:
Laboratory results are to be tabulated with reference to site name and purpose (internal, external, reference, control), site coordinates, sampling depth, sampling date, and number of days from completion of therapeutant treatment. A description of sample collection and processing must also be provided. A map showing all sampling sites and site names must be included.

Wild fish sampling:
Laboratory results must be tabulated with reference to site name and purpose (internal, external and reference), site coordinates, sampling date and number of days from completion of therapeutant treatment. A description of sample collection and processing to obtain pooled samples must also be provided. A map showing all sample positions and sites of wild fish capture must be included.

For each individual sample: fish species, fish length, sample weight and gut contents (pellets etc.) need to be specified. An explanation/reason for any fish not processed for residue analysis must be included. The table should be presented in the layout shown in Table 6.

Water sampling:
Laboratory results must be tabulated with reference to site name and purpose (internal, external, reference, control), sampling date, site coordinates, sampling depth, and number of days from completion of therapeutant treatment. A description of sample collection and processing must also be provided. A map showing all sampling sites and site names must be included.

Other sampling:
Laboratory results must be tabulated with reference to site names and purpose (internal, external, reference, control), sampling date, site coordinates and number of days from completion of therapeutant treatment. A description of sample collection and processing must also be provided. A map showing all sample positions must be included.

Any exceedances of maximum residue (MRL) or threshold levels must be highlighted.

Electronic data submission (alternatively provided in the report):

- Excel spreadsheet showing monitoring results, including sampling date and time, site names and quantifiers in relation to numeric results, utilising the layout in Table 6.
- GPS coordinates for all sampling sites.

Monitoring report:

- The monitoring report must provide a summary of all monitoring results and relevant contextual information.
- Interpretation of results, in written and graphical form, to show trends over time and against relevant benchmarks must be included in relation to all required monitoring.
- Details identifying specific personnel involved in the treatment and monitoring programs may be omitted.
- A map showing all sampling sites must be provided.

Table 6: Wild fish sampling - reporting layout

Sample Date	Specimen No.	Pooled Sample Bag No. (only for pooled samples)	Sample Weight	Fish Species (e.g. flathead, cocky salmon)	Fish Length (mm)	Gut Contents (e.g. pellets, other)
	1					
	2					
	3					
	4					
	5					
	6					