Aquaculture Stewardship Council Salmon Standard
Second Surveillance Assessment Report

Tassal Operations Pty Ltd Western Zone MF 214 Middle Harbour, MF 219 Gordon and MF 266 Franklin

Onsite Dates: 22-24 February 2016
Report release Date: May 23, 2016
ASC Audit Report - Opening

1 Title Page

<table>
<thead>
<tr>
<th>1.1 Name of Certificate Holder</th>
<th>Tassal Operations Pty Ltd</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.2 Report Title</td>
<td>Surveillance Audit Report</td>
</tr>
<tr>
<td>1.3 CAB name</td>
<td>SCS Global Services</td>
</tr>
<tr>
<td>1.4 Name of Lead Auditor</td>
<td>Dr. Sabine Daume</td>
</tr>
<tr>
<td>1.5 Names and positions of report authors and reviewers</td>
<td></td>
</tr>
<tr>
<td>Dr. Sabine Daume</td>
<td></td>
</tr>
<tr>
<td>David 'Dos' O'Sullivan - Technical Expert</td>
<td></td>
</tr>
<tr>
<td>Joseph Kochanski - Social Auditor</td>
<td></td>
</tr>
<tr>
<td>1.6 Client's Contact person: Name and Title</td>
<td></td>
</tr>
<tr>
<td>Heidi Hansen - Environmental Certification and Sustainability Officer</td>
<td></td>
</tr>
<tr>
<td>1.7 Date</td>
<td>February 22-24, 2016</td>
</tr>
</tbody>
</table>

2 Table of Contents

Section 1: Audit Report Opening
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Section 4: Audit Report Traceability
Section 5: Audit Report Summary

3 Glossary

Terms and abbreviations that are specific to this audit report and that are not otherwise defined in the ASC glossary

ABM Area Based Management
ADAS Australian Diver Accreditation Scheme
ADD Acoustic Deterrent Device
AHD Acoustic Harassment Device
AGD Amoebic Gill Disease
AMA Area Management Agreement
AMAMG Area Management Agreement Management Group
AMBI AZTI Marine Biotic Index
APC Australian Packaging Covenant
APVMA Australian Pesticides and Veterinary Medicines Authority
ASC Aquaculture Stewardship Council
ASI Accreditation Services International
ASX Australian Stock Exchange
AWU Australian Workers’ Union
AZE Allowable Zone Effect
BAP Best Aquaculture Practices
BET Bigeye Tuna
BMP Best Management Practices
BOD biochemical oxygen demand
BQI Benthic Quality Index
CAB Conformity Assessment Body
CoC Chain of Custody
CSIRO Commonwealth Scientific and Industrial Research Organisation
DHI DHI Water & Environment
DNA Deoxyribonucleic Acids
4 Summary
A concise summary of the report and findings. The summary shall be written to be readable to the stakeholders and other interested parties.

4.1 A brief description of the scope of the audit
The scope of this surveillance audit against the ASC Salmon Standard v1.0 includes the following sites from Tassal's Western Zone cluster: MF 214 Middle Harbour, MF 219 Gordon, and MF 266 Franklin.

4.2 A brief description of the applicant's operations
Tassal Group Ltd, founded in 1986, is an ASX 300 public company listed on the Australian Securities Exchange. Tassal is the largest salmon aquaculture company in Australia, employing over 1,200 people. A vertically integrated company, Tassal operates two salmon hatcheries, four processing facilities, two retail outlets and marine farms in four zones throughout the state. Tassal is producing salmon predominately for the Australian market, and has a retail presence in over 3,357 outlets around Australia. Tassal farms Atlantic salmon (Salmo salar) in open net cage farming systems that are polar circles with 120 m circumference, and maximum stocking densities of 15 kg/m$^2$.

4.3 A summary of the major findings
No major non-conformities were raised during this audit.

4.4 The Audit determination
The audit team recommends continued certification.

5 CAB Contact Information
5.1 CAB Name
SCS Global Services
5.2 CAB Mailing Address
99 Drummond Street
Carlton, VIC, 3053
Australia

5.3 Email Address
jkochanski@scsglobalservices.com

5.4 Other Contact Information

6 Background on the Applicant
6.1 Information on the Public Disclosure Form (Form 3) except 1.2-1.3 All information updated as necessary to reflect the audit as conducted.
N/A - Surveillance Audit

6.2 A description of the operation being evaluated
Tassal operates 3 farming leases/ grow out sites in Macquarie Harbour in Western Tasmania. The company's head office is located in Hobart, Tasmania.

6.3 Other certifications held by the applicant
The Macquarie Harbour sites have the following certifications: AS 4801, OHS AS 18001:2007. At the related processing facilities, Tassal also has other certifications such as ISO 9001:2008, HACCP, Halal and Kosher.

6.4 Estimated annual production volumes of the unit of certification
Commercially sensitive information submitted to ASC separately.

7 Scope
7.1 The Standard(s) against which the audit was conducted.
ASC Salmon Standard v1.0
ASC Salmon Audit Manual v1.0

7.2 The species produced at the applicant farm
Atlantic Salmon (Salmo salar)

7.3 A description of the scope of the audit including a description of whether the unit of certification covers all production or harvest areas (i.e. ponds) managed by the operation or located at the included sites, or whether only a sub-set of these are included in the unit of certification. If only a sub-set of production or harvest areas are included in the unit of certification these shall be clearly named.
The scope of this audit includes the 3 Tassal Salmon farms in Macquarie Harbour, Tasmania. These 3 farms represent one cluster of farms for the purpose of ASC auditing. During this audit, the Franklin farming lease (originally an independent certificate) was combined with the original Macquarie Harbour certificate (Middle Harbour and Gordon leases).

7.4 The names and addresses of any storage, processing, or distribution sites included in the operation (including subcontracted operations) that will potentially be handling certified products, up until the point where product enters further chain of custody.
None exist.

7.5 Description of the receiving water body(ies).
Macquarie Harbour

8 Audit Plan
8.1 The names of the auditors and the dates when each of the following were undertaken or completed: conducting the audit, writing of the report, reviewing the report, and taking the certification decision.
Dr. Sabine Daume - Lead Auditor
David O'Sullivan - Technical Expert
Joseph Kochanski - Social Auditor
Audit completed on February 22-14, 2016
Report writing: February 22 - March 21
Report Review: March 21 - March 25
Certification Decision: May 16, 2016

8.2 Previous Audits (if applicable):
May 11-15, 2015

8.3 Summary of previous ASC certification audit(s) and conclusion(s), with recommendations or conditions.
Continued certification recommended for Middle Harbour and Gordon farm leases. Initial certification recommended for Franklin farm lease. Minor NCs were issued at the Franklin Farm audit, but no conditions for certification were required.

8.4 Audit plan as implemented including:
Reviewed previous audit reports prior to the audit.

8.5 Desk reviews and other activities undertaken before or after any site visits.
Macquarie Harbour - February 23-24
Head Office (Hobart) - February 25

8.6 Site visits with date(s) and location(s).
Names and affiliations of individuals consulted or otherwise involved in the audit including representatives of the client, employees, contractors, stakeholders and any observers that participated in the audit.

David Kiemele - Head of Farming
Heidi Hansen - Environmental Certification and Sustainability Officer
Fiona Ewing - Community Engagement Officer
Craig Selkirk - Senior Manager - Freshwater
Matt Barrenger - Senior Manager - Environment
Ian Miles - Head of Safety
Angela Quinn - HR Manager
Christine Huynh - Senior Manager - Fish Health (Veterinarian/BVSc)
Tim Stephens - Fish Performance Manager - Operations (MH)
Chris Gatwardd - Fish Performance Manager - Technical (MH)
Steve Thompson - Compliance Coordinator (MH)
QA Representative/Supplier Verification
Dive Team Leader 1
Feeder 1
Feeder 2
Feeder 3
Harvest Vessel Skipper
Harvest Vessel Engineer
Net Cleaner/Operator
Environmental Assistant
Graeme Gardner, Indigenous Community Leader (ALCT)
Clyde Mansell, Indigenous Community Leader (ALCT)

Stakeholder submissions, including written or other documented information and CAB written responses to each submission.

<table>
<thead>
<tr>
<th>Name of stakeholder (if permission given to make name public)</th>
<th>Relevance to be contacted</th>
<th>Date of contact</th>
<th>CAB responded</th>
<th>Brief summary of points Raised</th>
<th>Use of comment by CAB</th>
<th>Response sent to stakeholder</th>
</tr>
</thead>
<tbody>
<tr>
<td>Graeme Gardner, Aboriginal Land Council of Tasmania (ALCT)</td>
<td>Indigenous Community Leader in Tasmania</td>
<td>2/22/2016</td>
<td>Yes</td>
<td>The auditor met with Graeme and Clyde of the ALCT to discuss the Tassal's engagement with the indigenous community of Tasmania. Both gentlemen indicated that Tassal had been in communication with them at various points in time and both parties (Tassal and the ALCT) felt good about the relationship. Various collaboration efforts are planned for 2016.</td>
<td>Yes, via in-person meeting</td>
<td></td>
</tr>
<tr>
<td>Clyde Mansell, Aboriginal Land Council of Tasmania (ALCT)</td>
<td>Indigenous Community Leader in Tasmania</td>
<td>2/22/2016</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
**Nonconformity Report Form**

**Definitions:**

*Minor Non-conformity*: Any non-conformity in which the client does not comply with the standard and those non-conformities do not jeopardize the integrity of the certified product. This includes: 1.) Where failure to comply with a requirement which is not likely to result in the breakdown of a system to meet an ASC requirement; 2.) Where the failure is a single observed lapse or isolated incident; 3.) Where there is no systemic failure to conform to ASC requirements; 4.) Where the impacts are limited in their temporal and spatial scale; 5.) Where there is minimal risk of the shipment of a product that does not conform to ASC requirements; 6.) Where the failure does not meet the definition of a Major Non-conformity; 7.) Where the failure will not produce a non-conforming product.

*Major Non-conformity*: Any non-conformity that has one or more of the following: 1.) The absence or total breakdown of a system that is likely to result in a failure to achieve the objective of the relevant ASC Criteria or another applicable certification requirement; 2.) Would result in the probable shipment of product that does not conform to ASC requirements; 3.) Is likely to result in a failure of the system or materially reduce the ability of the client to assure the integrity of the certified product; 4.) Is shown to continue over a long period of time; 5.) Is repeated; 6.) Is systematic or is the result of the absence or a total breakdown of a system; 7.) Affects a wide area and/or causes significant damage; 8.) Is not corrected or adequately responded to by the client once identified; 9.) Where two (2) or more minor non-conformities may together meet any of the above criteria.

**NOTE**: Open Non-conformities from the 2015 surveillance audit reports for Macquarie Harbour (Middle Harbour + Gordon) were combined with the NCs identified at the 2015 Franklin Farm site. The 2 existing ASC Salmon certificates held by Tassal will be combined into one cluster certificate pending the completion of this audit.

### NON-CONFORMITIES FROM THE PREVIOUS SURVEILLANCE AUDIT (2015)

<table>
<thead>
<tr>
<th>Text to be provided by:</th>
<th>2015 MH NCR1</th>
</tr>
</thead>
<tbody>
<tr>
<td>CAB NC Detected by</td>
<td>David O’Sullivan (DOS)</td>
</tr>
<tr>
<td>CAB Date Detected</td>
<td>5/11/2015</td>
</tr>
<tr>
<td>CAB Audit Reference</td>
<td>MF 266</td>
</tr>
<tr>
<td>CAB Status of NC</td>
<td>Open</td>
</tr>
<tr>
<td>CAB Grade of NC</td>
<td>Critical</td>
</tr>
<tr>
<td>CAB Observation</td>
<td>Minor</td>
</tr>
<tr>
<td>CAB Deadline for closing nonconformity</td>
<td>12 months</td>
</tr>
<tr>
<td>CAB Requirement Reference</td>
<td>ASC Salmon Standard V1.0 June 2012</td>
</tr>
<tr>
<td>CAB Clause Number</td>
<td>2.1.2b</td>
</tr>
<tr>
<td>CAB Text of Requirement</td>
<td>Indicator: Faunal index score indicating good [4] to high ecological quality in sediment outside the AZE, following the sampling methodology outlined in Appendix I-1 Requirement: AZTI Marine Biotic Index (AMBI [5])</td>
</tr>
</tbody>
</table>

**Description of the nonconformity.**

- Significant visual impact was observed at and near to 35m compliance sites, so MF 266 was not compliant with environmental standards as defined in the Licence conditions, Schedule 3.

**Statement of evidence detected**

- Refer above

**Statement of any errors of fact in the nonconformity**

- None provided

**Statement of the root cause of the nonconformity**

- Not required

**Response (include the name of the author and date submitted)**

- "Organic drift from cages on new lease too close to lease edge"
- "New site so sediments have not fully adjusted to the organic loadings from the farming operation"

**Statement of the corrective actions proposed and taken**

- "Removed cages from four pen bay positions (Positions 1, 2, 43 and 44)"
- "Commitment to four monthly regulation surveys"

**Evaluation by CAB (include the name of the author and date submitted)**

- DOS 26022016 RCA accepted
- DOS 26022016 CA accepted
<table>
<thead>
<tr>
<th>Client</th>
<th>Statement of the preventive actions proposed and taken (include the name of the author and date submitted)</th>
</tr>
</thead>
<tbody>
<tr>
<td>CAB</td>
<td>• Site (MF219) offered up for TRF and FRDC projects for the next 3-4 years&lt;br&gt;• Depositional outputs to be produced for next planned stocking to assess where organics hotspots may be&lt;br&gt;• Continual DO monitoring onsite with new monitoring equipment (am and pm)&lt;br&gt;• Further ADCP data to be collected at the site to monitor hydrodynamics throughout the water column&lt;br&gt;• Full review of feed management and equipment to be undertaken&lt;br&gt;• Development of new position Fish performance Manager - Technical to manage feed and environmental conditions and influences</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>CAB</th>
<th>Evaluation by CAB (include the name of the author and date submitted)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>DOS 26022016 PA accepted</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>CAB</th>
<th>Date on which the nonconformity was closed.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2/26/2016</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>NCF 2015 - 2</th>
<th>CAB</th>
<th>NC Reference</th>
<th>2015 MH NCR2</th>
</tr>
</thead>
<tbody>
<tr>
<td>CAB</td>
<td>NC Detected by</td>
<td>David O’Sullivan (DOS)</td>
<td></td>
</tr>
</tbody>
</table>
EVALUATION RESULTS ASC SALMON v1.0

PRINCIPLE 1: COMPLY WITH ALL APPLICABLE NATIONAL LAWS AND LOCAL REGULATIONS

Compliance Criteria (Required CAB Actions) | Auditor Evaluation (Required CAB Actions) | Evidence
--- | --- | ---
A. Maintain digital or local copies of applicable land and water use laws. | A. Review compliance with applicable land and water use laws. | To perform an evaluation, CABs will review copies of applicable land and water use laws. To ensure the CAB evaluates the information, they must ensure they have access to all relevant laws and regulations.
B. Maintain original or digital copies of lease agreements and land titles or concessionary period if not applicable. | B. Confirm client holds original or digital copies of lease agreements and land titles. | Key evidence is the status of any such agreements and land titles.
C. Review records for compliance with federal and local laws and regulations (if such inspections are legally required in the country of operation). | C. Review inspection records for compliance with national and local laws and regulations (as applicable). | Key inspection records will be reviewed and assessed.
D. Verify facility does not conflict with national preservation areas and the required operational permits if situated in such an area. (2.4.2) | D. Verify facility does not conflict with national preservation areas and the required operational permits if situated in such an area. (2.4.2) | To verify adherence to preservation areas, CABs will review applicable operational permits.

**Criterion 1.1 Compliance with all applicable local and national legal requirements and regulations**

**PRINCIPLE 1: COMPLY WITH ALL APPLICABLE NATIONAL LAWS AND LOCAL REGULATIONS**

**EVALUATION RESULTS ASC SALMON v1.0**

**1.1.1**

**All**

**Yes**

**demonstrating compliance with all**

**All**

**Applicability:**

**Requirement:** Yes

**Auditor:** A3

**Indicator:** Presence of documents demonstrating compliance with local and national regulations and requirements on land and water use.

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**1.1.2**

**All**

**Yes**

**b. Compile list of and comply with all discharge laws or regulations.**

---

**1.1.3**

**All**

**Yes**

**b. Maintain digital or local copies of applicable land and water use laws.**

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**1.1.4**

**All**

**Yes**

**b. Review all relevant national and local laws and regulations (as applicable).**

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**Table of Schedule 1 to 4**

**Schedule 1 MH Fish Health Management Plan (V1.0 Dec'12 FHMP, 35p) prepared jointly by three Veterinarians on behalf of Tassal, PA & HAC, includes notifiable diseases.**

**Schedule 2 MH Area Management Agreement (V1.0 Dec '12, 37p) EMP for joint sustainable management.**

**Schedule 3 MH Data collection (V1.0 Dec'12, 5p) FFEMP and FHMP covered above in 1.4; current data on FishTalk.**

**Schedule 4 MH Working groups (V1.0 Dec'12, 5p) include discussions and agreements on water quality monitoring as well as full health and other CAB group initiatives, including SBD.**

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**Table of Schedule 5 to 8**

**Schedule 5 MH Farm permits and licenses detailed above in 1.1.1.**

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**Table of Schedule 9 to 12**

**Schedule 9 MH Marine Farming Leases (including lease boundaries and lighting requirements), expires 14/01/13 to 31/1/43 and lease boundaries/corners set since 14/01/13;**

**Schedule 10 MH Environmental Impact Statement and Appendices.**

**Schedule 11 MH High Risk Environment (HRE) sites which have been occupied prior to April 2015;**

**Schedule 12 MH National Park and other Environmentally Significant areas (as applicable).**

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**Table of Schedule 13 to 15**

**Schedule 13 MH Annual taxation payments are detailed in the Annual Reports, for example FY13/14 & FY14/15 on p5 of 2015 Annual Report (82p).**

**Schedule 14 MH Tassal uses the ATO Legal Database website for Australian Taxation Legislation for the jurisdiction in which Tassal operates [http://ato.gov.au/atoweb/Browse.htm?node=OB&lnk=Collapse] ATO’s declaration signs**

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**Table of Schedule 16 to 18**

**Schedule 16 MH Tassal Group Ltd - ACN 106 067 270, ABN 15 106 067 270**

**Schedule 17 MH Operations Pty Ltd - ACN 106 127 127, ABN 38 106 127 127**

**Schedule 18 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 19 to 21**

**Schedule 19 MH The National Employment Standards (NES) 2010, 2p to 1997 (as amended) include discussions and agreements on working conditions as well as full health and other CAB group initiatives, including SBD.**

**Schedule 20 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 22 to 24**

**Schedule 21 MH Tassal Group Ltd is an ASX 300 publically listed company on the Australian Securities Exchange. As part of the Corporate Governance they must comply with a number of Business & Operating licenses as detailed in Land and Water use laws to operate the 3 farms.**

**Schedule 22 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 25 to 27**

**Schedule 23 MH Tassal Group Ltd - ACN 106 067 270, ABN 15 106 067 270**

**Schedule 24 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 28 to 30**

**Schedule 25 MH Tassal Group Ltd - ACN 106 067 270, ABN 15 106 067 270**

**Schedule 26 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 31 to 33**

**Schedule 27 MH Tassal Group Ltd - ACN 106 067 270, ABN 15 106 067 270**

**Schedule 28 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 34 to 36**

**Schedule 28 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 37 to 39**

**Schedule 29 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 40 to 42**

**Schedule 30 MH Tassal Group Ltd - ACN 106 067 270, ABN 15 106 067 270**

**Schedule 31 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 43 to 45**

**Schedule 31 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 46 to 48**

**Schedule 32 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 49 to 51**

**Schedule 33 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 52 to 54**

**Schedule 34 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 55 to 57**

**Schedule 35 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 58 to 60**

**Schedule 36 MH Tassal’s Corporate Governance and Code of Conduct.**

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**Table of Schedule 61 to 63**

**Schedule 37 MH Tassal’s Corporate Governance and Code of Conduct.**
C. Review results to ensure all requirements of the Standard are demonstrated.

D. Submit test results to ASC as per Appendix VI at least once for each production cycle. If the farm has hard bottom and cannot complete tests, report this to ASC.

E. Confirm that the farm has submitted test results to ASC (Appendix VI).

F. Audits and inspections to ensure all requirements of the Standard are demonstrated.

G. Provide evidence (if applicable) to justify the use of a site-specific AZE.

H. Confirm that farm submitted test results to ASC (Appendix VI).

I. Audit results comply with the Standar...
Auditor Evaluation (Required CAB Actions):

C. Review calculation and confirm all weekly averages ≥ 70%.

Criterion 2.2 Water quality in and near the site of operation [12]

Footnote [12] See Appendix VI for transparency requirements for 2.2.1, 2.2.2, 2.2.3 and 2.2.5.

2.2.2 have national or regional coastal water quality targets.

Footnote [7] Robust and credible: The SEPA AUTODEPOMOD modeling system is considered to be an example of a credible and robust tool for assessing the environmental impact of aquaculture. The model must include a multi-parameter approach. Monitoring must be used to ground-truth the AZE proposed through the model.

Footnote [6] neue_1275 noted in [1]

≥ 2 highly abundant macrofaunal taxa. All farms except as noted in [10] or 10% of the total number of taxa identified in the reference site are highly abundant.

Footnote [5] DO tracking across the farms and comparisons to the controls is now conducted routinely.

Footnote [4] The FPM-T commented that higher DO are expected at the 214 lease due to its proximity to the mouth with increased water flow, while 266 is furthest away and it is near mouth of the Gordon and so it can be adversely affected.

Footnote [3] Instruction to Clients for Indicator 2.2.1 - Monitoring Average Weekly Percent Saturation of Dissolved Oxygen

Footnote [2] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

Footnote [1] In use DashBoard reference for broad scale and near field camera, for water quality and fallowing (benthic) regimes.

Footnote [0] now calculated: the spreadsheet Weekly Average % saturation DO at 5m with Saturation 5.0 Avg [%] calculated for each period since 17/05/15 (raw data is held in the spreadsheet). The Weekly averages have dropped below 70% at 266 since 01/02/16, 219 since 01/01/16 & 214 since 17/01/16.

Footnote [0] At the Table Head Reference Site (MF 214 and WF 219) the DO has also been below 70% (pink) from 17/01/16 to 14/02/16 and at the Frankline Reference Site (MF 266) from 17/01/15 to 14/01/16. This indicates that the FRM-T commented that higher DO are expected at the 214 lease due to its proximity to the mouth with increased water flow, while 266 is furthest away and it is near mouth of the Gordon and so it can be adversely affected.

Footnote [0] DO tracking across the farms and comparisons to the controls is now conducted routinely. Weekly averages will be extracted from FishTalk at the end of each week for farms sites and the reference sites. If percent saturation of DO ≥ 70%, on farm results will be compared to results from a reference site. New Email alert which is auto-generated from daily data-dump from FishTalk - spit 214/219/219 and 266.

Footnote [0] New Zero Harm program.

Footnote [0] Results were submitted to the ASC.

Footnote [0] Summary: Minor NC is closed.

Footnote [0] The systems are not typically used in the same way by different farms, making it challenging to compare across farms. However, the systems are considered robust and credible based on modeling using multi-parameter approaches.

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Footnote [0]sum of range measurement is observed, raise a nonconformity.

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Auditor Evaluation (Required CAB Actions):

Criterion 2.4 Interaction with critical or sensitive habitats and species

2.3 Nutrient release from production

Footnote

Instruction to Clients for Indicator 2.3.1・Calculation of Biochemical Oxygen Demand (BOD)
Both BOD and BODT may be calculated based on cumulative inputs of N and C. The BODT calculation can be used to estimate nutrient reduction in the receiving water. The BOD calculation is based on cumulative inputs of N and C to the environment over the production cycle. BODT = (Total N in feed − Total N in fish) + (Total C in feed − Total C in fish).

Footnote

Footnote

Yield

Biochemical Oxygen Demand (BOD) can be calculated based on cumulative inputs of N and C to the environment over the production cycle: BOD = ((total N in feed – total N in fish)*4.57) + ((total C in feed – total C in fish)*2.67).

Footnote

2.3.1 To be measured every quarter or every three months. Samples that are measured shall be chosen randomly. Feed may be sampled quarterly. To be measured at farm gate (e.g., from feed bags after they are delivered to farm).

Footnote

Note 1: Calculation requires a full production cycle of data and is required beginning with the production cycle first undergoing certification. It is the first BOD for the farm, the client is required to demonstrate to the CAB that the farm is being monitored and understanding the calculations.

Footnote

Note 2: BOD may be calculated in Appendix VI. This includes the calculation methodology in Appendix I-3. A new Task Breakdown MO-374 Quarterly Calculation of Percentage Fines in Feed (Issue 1) has been developed and is in use. This includes using a sieve by hand for the quarterly feed samples from each barge with different masses or less, or 0.2% for the particle diameter when the particle diameter is more than 5mm.

Footnote

The yield is calculated as the percentage of N & C removed from the feed through biofiltration, sedimentation, or other means. The yield shall be calculated annually and the results reported to ASC along with the methodology in Appendix I-3.

Footnote

Note 2: Farms may seek an exemption to Indicator 2.2.5 if: the farm collects BOD samples at least once every two weeks, samples are independently analyzed by an accredited laboratory, and the farm can show that BOD monitoring results do not deviate significantly from calculated annual BOD load.

Footnote

Note 1: Calculation requires a full production cycle of data and is required beginning with the production cycle first undergoing certification. It is the first BOD for the farm, the client is required to demonstrate to the CAB that the farm is being monitored and understanding the calculations.

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Footnote

The yield is calculated as the percentage of N & C removed from the feed through biofiltration, sedimentation, or other means. The yield shall be calculated annually and the results reported to ASC along with the methodology in Appendix I-3.
Auditor Evaluation (Required CAB Actions):

See Appendix VI for transparency requirements for 2.5.2, 2.5.5 and 2.5.6.

Criterion 2.5 Interaction with wildlife, including predators

Footnote

Footnote

Footnote

2.4.1

• For HCVAs if the farm can demonstrate that its environmental impacts are compatible with the conservation objectives of the HCVA designation.

The following exceptions shall be made for Standard 2.4.2:

[25]

High Conservation Value Areas (HCVA): Natural habitats where conservation values are considered to be of outstanding significance or critical importance. HCVA are defined as: a clearly defined geographical space, recognized, dedicated and managed through legal or other effective means, to achieve the long-term conservation of nature with associated ecosystem services and cultural values. (IUCN 2008, Definitions)

Definitions

- Exception #3: For farms located in a protected area if it was designated as such after the farm was already in operation. For these farms, the requirement of 2.4.2 is not applicable; however, the farm is allowed an exception to the requirements. If yes, inform the CAB of the exception and is ineligible for ASC certification.
- Exception #2: For farms located in a protected area if it was declared as such after the farm was already in operation. For these farms, the requirement of 2.4.2 is not applicable; however, the farm is allowed an exception to the requirements. If yes, inform the CAB of the exception and is ineligible for ASC certification.
- Exception #1: For protected areas classified by the International Union for the Conservation of Nature (IUCN) as Category V or VI (these are areas preserved primarily for their landscapes or for sustainable resource management).

The following exceptions shall be made for Indicator 2.5.2:

- Exception #3: If the farm can demonstrate that its environmental impacts are compatible with the conservation objectives of the HCVA designation. The burden of proof would be placed on the farm to demonstrate that it is not negatively impacting the core reason an area has been identified as a HCVA.
- Exception #2: If the farm is located in a protected area or HCVA and hence eligible for ASC certification.
- Exception #1: If the farm is located in a protected area or HCVA.

In recent draft report (Ross et al., 2016, Project No 2014/008) has been sent out for initial comment. It reports that DentilBed Polychoetes have been found to be two different species and indicate different responses to sediments and benthic ecosystems interaction and help with the understanding of what indicator species are useful within different systems around the state.

In each assessment, the evidence of these species have been found to extend into the TW WHA.

A recent draft report (Ross et al., 2016, Project No 2014/008) has been sent out for initial comment. It reports that DentilBed Polychoetes have been found to be two different species and indicate different responses to sediments and benthic ecosystems interaction and help with the understanding of what indicator species are useful within different systems around the state.

A Macquarie Harbour Dissolved Oxygen Working group was established in 2014 to verify the scope of DO reductions and to determine attribution, and to work cooperatively in the study of DO issues; a detailed assessment has been carried out to determine whether the erosion of the marine farming zone.

Annual Compliance Survey Report February 2015 included video surveys which show the presence of numerous opportunistic polychaetes on the sediment surface outside lease areas and extending into the TW WHA. Thus MF 214 lease may have this impact.

MF 265 is less than 1 km from the TW WHA at its closest point, the other two less than (MF 214 & 219) are several kilometres away.

Tassal provided a declaration dated 11 December 2013 before the 2014 and 2015 onsite visits.

Tassal's declaration was on 11 December 2013 before the 2014 and 2015 onsite visits.

N/A

N/A

MF 265 remains less than 1 km from the TW WHA at its closest point, the other two leases (MF 214 & 219) are several kilometres away.

Tassal provided a declaration dated 11 December 2013 before the 2014 and 2015 onsite visits.

N/A

N/A

MF 265 is less than 1 km from the TW WHA at its closest point, the other two less than (MF 214 & 219) are several kilometres away.

Tassal provided a declaration dated 11 December 2013 before the 2014 and 2015 onsite visits.

N/A

N/A

MF 265 is less than 1 km from the TW WHA at its closest point, the other two leases (MF 214 & 219) are several kilometres away.

Tassal provided a declaration dated 11 December 2013 before the 2014 and 2015 onsite visits.

N/A

N/A

MF 265 is less than 1 km from the TW WHA at its closest point, the other two leases (MF 214 & 219) are several kilometres away.

Tassal provided a declaration dated 11 December 2013 before the 2014 and 2015 onsite visits.

N/A

N/A

MF 265 is less than 1 km from the TW WHA at its closest point, the other two leases (MF 214 & 219) are several kilometres away.

Tassal provided a declaration dated 11 December 2013 before the 2014 and 2015 onsite visits.

N/A

N/A
C. During the on-site audit, inspect the farm to confirm that no acoustic deterrent device (ADD) or acoustic harassment device (AHD) was used.

Requirement: 0


Footnote: All footnotes refer to the data where the first standards and accompanying guidelines are completed and made publicly available. This definition of publication applies throughout this document.

2.5.3: Review records for completeness. Cross-check mortality evidence with farm staff and community representatives.

2.5.4: Maintain a log and cross-check with records of predator incidents.

2.5.4a: Provide a written statement affirming that the farm's management is committed to eradicate all usage of acoustic deterrent devices (ADDs) or acoustic harassment devices (AHDs) by June 13, 2015.

Requirement: 0

Applicability: All

Footnote: Footnotes refer to the data where the first standards and accompanying guidelines are completed and made publicly available. This definition of publication applies throughout this document.

2.5.4b: Review documentary evidence (e.g. predator management policies, records of predator incidents and cross-check against interviews with farm staff and local community members).

2.5.4c: During the on-site audit, inspect the farm to confirm that no ADDs or AHDs are present at the facilities (applicable only after June 13, 2015).

Requirement: 0


Footnote: All footnotes refer to the data where the first standards and accompanying guidelines are completed and made publicly available. This definition of publication applies throughout this document.
**Auditor Evaluation (Required CAB Actions):**

2) any effluent released by the farm to the natural environment has been effectively treated to kill pathogens (e.g. UV and/or chemical treatment of water with testing demonstrating efficacy).

1) the farm does not release any water to the natural environment; or

According to footnote [38], farm sites for which there is no release of water that may contain pathogens into the natural (freshwater or marine) environment are exempt from the standards under Criterion 3.1. In practice these animals will usually be seals or birds.

**Instruction to Clients and CABs on Exemptions to Criterion 3.1**

Footnote [38] Farm sites for which there is no release of water that may contain pathogens into the natural (freshwater or marine) environment are exempt from the standards under Criterion 3.1.

**Instruction to Clients and CABs on Indicators 2.5.5, 2.5.6, and 2.5.7 - Clarification about the ASC Definition of “Lethal Incident”**

- A demonstrated commitment (4) to collaborate with NGOs, academics and governments or areas of mutually agreed research to measure possible impacts on wild stocks.

- A demonstrated commitment (4) to collaborate with NGOs, academics and governments or areas of mutually agreed research to measure possible impacts on wild stocks.

**PRINCIPLE 3: PROTECT THE HEALTH AND GENETIC INTEGRITY OF WILD POPULATIONS**

**Criterion 3.2 Introduced or amplified parasites and pathogens [34,39]**

**Compliance Criteria (Required Client Actions):**

- Keep records showing that the farm undertakes an appropriate risk assessment following each lethal incident and how those risk assessments are used to identify concrete steps the farm takes to reduce the risk of future incidents.

- Provide documentary evidence that the farm implements steps described in 3.1.7 to reduce the risk of future lethal incidents.

- Submit dates of fallowing period(s) as per Appendix VI to ASC at least once per year.

- Data was submitted to the ASC.

**Applicability:**

- All except farms that release no water as noted in [34]

<table>
<thead>
<tr>
<th>Requirement</th>
<th>Yes</th>
<th>No</th>
</tr>
</thead>
<tbody>
<tr>
<td>Applicability</td>
<td>All farms for which there is no release of water that may contain pathogens into the natural (freshwater or marine) environment are exempt from the standards under Criterion 3.1.</td>
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</tr>
</tbody>
</table>

**Footnote:**

[34] Lethal action: Action taken to deliberately kill an animal, including marine mammals and birds.

[35] Lethal incident: Includes all actions, as well as entanglements or other accidental mortalities of non-salmonids.

[36] Standard 3.4 is applicable to incidents related to non-endangered and non-threatened species. This standard complements, and does not contradict, 3.1-3.

**Instruction to Clients and CABs on Entanglements to Criterion 3.1**

- As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. The criteria was not evaluated in the 2016 surveillance audit.

- As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. The criteria was not evaluated in the 2016 surveillance audit.

- To demonstrate a commitment to collaborate with NGOs, academics and governments or areas of mutually agreed research to measure possible impacts on wild stocks. If the farm does not release any water to the natural environment or any fatal released by the farm to the natural environment has been effectively treated to kill pathogens, the farm may demonstrate commitment by showing evidence of commitment through other pr
3.1.4 Requirement: Yes

Indicator: Establish and annual review of a management plan to release no water within 50 kilometers of the farm. This plan should be reviewed annually and if applicable, the farm should include information from monitoring of wild salmon.

B. Confirm that the farm has submitted the AMO requirements to ASC (Appendix VI).

C. Review the farm's methodology for testing sea lice. If applicable, confirm that the farm has made the testing results from 3.1.4b easily publicly available (e.g. on a website).

3.1.6 Requirement: Yes

Indicator: Keep records of when and where test results were made public.

A. Review the results of on-farm testing for sea lice. If the farm participates in monitoring of sea lice, the methodology used for testing sea lice must be reviewed and approved.

B. Review the farm's annual schedule for testing sea lice. If applicable, evaluate whether the farm has set (3.1.3a) and annually reviewed (3.1.3b) maximum sea lice levels to be in compliance with requirements in Appendix II-2.

3.1.8 Requirement: Yes

Indicator: Establish and review the farm's schedule for sea lice testing.

A. Review the farm's schedule for sea lice testing to confirm that testing follows the farm's schedule. Review the rationale for any deviations from the schedule.

B. Review the farm's methodology for testing sea lice. If not applicable, confirm that the farm has made the testing results from 3.1.4b easily publicly available (e.g. on a website).

C. Review the farm's methodology for testing sea lice. If applicable, confirm that the farm has made the testing results from 3.1.4b easily publicly available (e.g. on a website).

D. Review the farm's annual schedule for testing sea lice. If applicable, evaluate whether the farm has set (3.1.3a) and annually reviewed (3.1.3b) maximum sea lice levels to be in compliance with requirements in Appendix II-2.

Footnote (A) Test results must be weekly and during immediately prior to sensitive periods for wild salmonids, such as outmigration of wild juvenile salmon. Testing must be at least monthly during the rest of the year, unless water temperature is so cold that it would jeopardize farm health for test to be done (below 4 degrees C). Within closed production systems, alternative methods for monitoring sea lice, such as video monitoring, may be permitted.

Footnote (B) As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.
**Criterion 3.2: Introduction of non-native species**

**Compliance Criteria (Required CAB Actions):**

- Provide evidence that the farm produces non-native species.
- Maintain records (e.g. invoices) to show the species name and origin.
- Ensure the farm complies with the requirements in 3.1.4.
- Ensure that results are easily publicly available and that they are submitted to the CAB.

**Applicability:** All farms operating in areas with wild salmonids except as noted in [48].

**Requirement:** Yes, within five years of publication of the SAD standard [50].

**Note:** For the purposes of Indicator 3.2.1, "area" is defined as an ecological body of water; for the purposes of Indicator 3.2.2, "area" is defined as a contiguous body of water with the biochemical and biological characteristics that support the presence of the non-native species.

**Footnote:** [48] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

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**Criterion 3.1.6: Introduction of non-native species**

**Compliance Criteria (Required CAB Actions):**

- Provide evidence that the farm produces non-native species.
- Maintain records (e.g. invoices) to show the species name and origin.
- Ensure the farm complies with the requirements in 3.1.4.
- Ensure that results are easily publicly available and that they are submitted to the CAB.

**Applicability:** All farms operating in areas with wild salmonids except as noted in [48].

**Requirement:** Yes, within five years of publication of the SAD standard [50].

**Note:** For the purposes of Indicator 3.2.1, "area" is defined as a contiguous body of water with the biochemical and biological characteristics that support the presence of the non-native species.

**Footnote:** [48] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

---

**Criterion 3.1.5: Introduction of non-native species**

**Compliance Criteria (Required CAB Actions):**

- Provide evidence that the farm produces non-native species.
- Maintain records (e.g. invoices) to show the species name and origin.
- Ensure the farm complies with the requirements in 3.1.4.
- Ensure that results are easily publicly available and that they are submitted to the CAB.

**Applicability:** All farms operating in areas with wild salmonids except as noted in [48].

**Requirement:** Yes, within five years of publication of the SAD standard [50].

**Note:** For the purposes of Indicator 3.2.1, "area" is defined as a contiguous body of water with the biochemical and biological characteristics that support the presence of the non-native species.

**Footnote:** [48] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

---

**Criterion 3.1.4: Introduction of non-native species**

**Compliance Criteria (Required CAB Actions):**

- Provide evidence that the farm produces non-native species.
- Maintain records (e.g. invoices) to show the species name and origin.
- Ensure the farm complies with the requirements in 3.1.4.
- Ensure that results are easily publicly available and that they are submitted to the CAB.

**Applicability:** All farms operating in areas with wild salmonids except as noted in [48].

**Requirement:** Yes, within five years of publication of the SAD standard [50].

**Note:** For the purposes of Indicator 3.2.1, "area" is defined as a contiguous body of water with the biochemical and biological characteristics that support the presence of the non-native species.

**Footnote:** [48] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

---

**Criterion 3.1.3: Introduction of non-native species**

**Compliance Criteria (Required CAB Actions):**

- Provide evidence that the farm produces non-native species.
- Maintain records (e.g. invoices) to show the species name and origin.
- Ensure the farm complies with the requirements in 3.1.4.
- Ensure that results are easily publicly available and that they are submitted to the CAB.

**Applicability:** All farms operating in areas with wild salmonids except as noted in [48].

**Requirement:** Yes, within five years of publication of the SAD standard [50].

**Note:** For the purposes of Indicator 3.2.1, "area" is defined as a contiguous body of water with the biochemical and biological characteristics that support the presence of the non-native species.

**Footnote:** [48] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.
### Criterion 3.3 Introduction of transgenic species

<table>
<thead>
<tr>
<th>Compliance Criteria (Required Client Actions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maintain monitoring records of all instances of confirmed or suspected escapes, specifying date, cause, and estimated number of escapes.</td>
</tr>
<tr>
<td>Aggregate cumulative escapes in the most recent production cycle.</td>
</tr>
<tr>
<td>Maintain records to the edge of detail including stock identities, supplier name, address and contact person(s) for stock purchases.</td>
</tr>
<tr>
<td>Ensure purchase documents confirm that the culture stock is not transgenic.</td>
</tr>
<tr>
<td>If an escape episode occurs (i.e. an incident where &gt; 100 fish escaped), the farm may request a rare exception to the Standard. Requests must provide a full account of the episode and document how the farm could not have predicted the events that caused the escape episode.</td>
</tr>
<tr>
<td>Submit escape monitoring data to ASC per Appendix V in an ongoing basis (i.e. at least once per year and per each production cycle).</td>
</tr>
</tbody>
</table>

### Auditor Evaluation (Required CAB Actions)

- Review client submission for completeness and accuracy of information. Check with the estimate of unexplained loss, verification records for small tears in net, predator attacks, etc. |
- Review the calculation and confirm compliance with the requirements. |
- Confirm that farm documents show continuous monitoring of escapes. |
- Review the farm’s request for a rare exception to the Standard for an escape event. Confirm no prior exceptional events were documented during the previous 10 years, or since the date of the start of the production cycle during which the farm first applied for certification. An example of an exceptional event is a breakdown of the farm, events that are not considered exceptional include failures is monitoring due to bad weather, boat traffic incidents due to poor marking of the farm, human error, |
- Submit the farm has submitted escape monitoring data to ASC (Appendix V). |

### Footnote

See Appendix VI for transparency requirements for 3.4.1, 3.4.2, and 3.4.3.

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### Criterion 3.4 Escapes (50)

<table>
<thead>
<tr>
<th>Compliance Criteria (Required Client Actions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maintain records of accuracy of the counting technology used by the farm at times of stocking and harvest. Records include copies of spec sheets for counting machines and common estimates of error for hand counts.</td>
</tr>
<tr>
<td>If counting takes place off site (e.g. pre-smolt vaccination count), obtain and maintain documents from the supplier showing the accuracy of the counting method used (as above).</td>
</tr>
<tr>
<td>During audits, engage the auditor to witness calibration of counting machines (if used by the farm).</td>
</tr>
<tr>
<td>Submit counting technology accuracy to ASC per Appendix VI in an ongoing basis (i.e. at least once per year and per each production cycle).</td>
</tr>
</tbody>
</table>

### Auditor Evaluation (Required CAB Actions)

- Confirm that the farm keeps records of counting technology for the counting technology or method used on site at stocking and harvest. |
- Verify that the farm calibration counting equipment as recommended by the manufacturer. |
- Obtain the farmers’ own copies of the farm counting technology or counting method it is 98% as both stocking and harvest. Stated accuracy shall be determined by the spec sheet for counting machines and through common estimates of error for any hand counts. |
- Confirm that client has submitted counting technology accuracy to ASC (Appendix VI). |

### Footnote

- Accuracy shall be determined by the spec sheet for counting machines and through common estimates of error for any hand counts. |

---

### Instruction to Clients for Indicator 3.4.3 - Calculation of Estimated Unexplained Loss

The Estimated Unexplained Loss (EUL) is calculated at the end of each production cycle as follows: EUL = (stocking count) - (harvest count) - (mortalities) - (recorded escapes).

### Footnote

- The focus on escape prevention and unexplained loss is discussed in the 2015 Sustainability report (p 12, 21, 26 & 35).
- Review documentary evidence showing implementation of the Auditor Evaluation (Required CAB Actions):
  - Can the farm demonstrate compliance with the requirements of indicators 3.4.4?
  - Can the farm demonstrate compliance with the requirements of indicators 3.4.6?
  - Can the farm demonstrate compliance with the requirements of indicators 3.4.6?
  - Can the farm demonstrate compliance with the requirements of indicators 3.4.6?

- Interview farm workers to confirm that the plan is implemented:
  - Can the farm provide evidence of escape prevention and counting and worker training on escape prevention and counting technologies?
  - Can the farm provide evidence of escape prevention and counting and worker training on escape prevention and counting technologies?

- Review declaration from each feed supplier to confirm the feed supplier has submitted a declaration:
  - Can the farm provide evidence of escape prevention and counting and worker training on escape prevention and counting technologies?
  - Can the farm provide evidence of escape prevention and counting and worker training on escape prevention and counting technologies?

**PRINCIPLE 4: USE RESOURCES IN AN ENVIRONMENTALLY EFFICIENT AND RESPONSIBLE MANNER**

To ensure that feed suppliers comply with the more detailed requirements for traceability and accountability that are specified in indicators 3.4.1 through 4.4.2, the ASC Salmon Standard includes requirements to ensure that feed suppliers are able to demonstrate compliance with these requirements. In addition to the above, farms must also show that their feed suppliers comply with the more detailed requirements for traceability and accountability that are specified in indicators 4.4.1 through 4.4.2.

### Method 3:
- Farms may choose to source feed from feed producers who use only those ingredients allowed under the ASC Salmon Standards during the production of a given batch of feed. For example, the farm may request its feed supplier to produce a batch of feed according to farm specifications. Audits of the feed producer will independently verify that manufacturing processes are in compliance with ASC requirements.

### Method 4:
- Farms may choose to source feed from feed producers who demonstrate compliance using a "mass balance" method. In this method, feed producers demonstrate compliance using a "mass balance" method. This method requires the feed producer to maintain records of all feed purchases, deliveries, transfers, and usage data. The feed producer must also provide evidence that all feed purchases, deliveries, transfers, and usage data are entered into FishTalk. The feed producer must also provide evidence that all feed purchases, deliveries, transfers, and usage data are entered into FishTalk. The feed producer must also provide evidence that all feed purchases, deliveries, transfers, and usage data are entered into FishTalk. The feed producer must also provide evidence that all feed purchases, deliveries, transfers, and usage data are entered into FishTalk.

The EUL is made available publicly through the company’s ASC dashboard at www.tassal.com.au. Thus the EUL is expected to improve with lower figures recorded. The new Mortality Extraction System soon to be on each pen will mean this being addressed, farm staff are expected to be able to bring forward accurate information about their inventory and production ratios. Improved feeding practice has also helped. The feed rates are used to determine if the inventory is intact, or if there has been some losses or leakage through small holes from seals. None reported this year.

- Footnote (35) Calculated at the end of the production cycle as ‘unexplained loss’ = starting count – harvest count – mortalities – other known escapes. Where possible, use all the pre-slaughter estimated count as the starting count is preferred.

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I. Traceability of all materials in feed:

**Compliance Criteria (Required Client Actions):**

**Auditor Evaluation (Required CAB Actions):**

**Instruction to Clients for Indicators 4.1.1 through 4.4.2: Sourcing of Responsible Produced Salmon Feeds**

- Farms must show that all feeds used by the farm are produced in compliance with the requirements of indicators 4.1.1 through 4.4.2. To do so, farms must provide documentary evidence that the feed producer (see note 1) is audited at regular intervals by an independent auditing firm or a conformity assessment body against a recognized standard which substantially incorporates requirements for traceability. Acceptable certificates demonstrate that feed producers have robust information systems and information handling processes to allow the feed producers to be able to bring forward accurate information about their inventory and production ratios. Declarations from the feed producer that are provided to the farm to demonstrate compliance with these indicators must be supported by the audits. Farms must also show that all of their feed producers are duly informed of the requirements of the ASC Salmon Standard relating to sourcing of responsible produced salmon feed (see 4.1.1 below).

In the past traceability audits were undertaken by SGS annually to confirm that Skretting compliance using the ‘mass balance’ method (Method #2). The audit was mainly a surveillance audit, the focus of the audit has involved open pen conformity, with several other criteria checked at random. The criteria was not evaluated during the 2016 Surveillance Audit.

The EUL is a trade secret of the holding company for Tassal and is not available to the public. The EUL is available to Tassal staff and is only used in the event of an audit. The EUL is made available publicly through the company’s ASC dashboard at www.tassal.com.au.

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**Compliance Criteria (Required Client Actions):**

**Auditor Evaluation (Required CAB Actions):**

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The EUL is a trade secret of the holding company for Tassal and is not available to the public. The EUL is available to Tassal staff and is only used in the event of an audit. The EUL is made available publicly through the company’s ASC dashboard at www.tassal.com.au.
F. Cross-check the declarations against results from audits of feed suppliers (if any) to verify evidence of required levels of traceability.

In the case of feed suppliers, the client shall ensure the feed producer uses a lead farm with sufficient evidence of traceability that can be cross-checked against the farm site information and feed processor’s records. The farm site for a complete production cycle. This data can be used to calculate the FFDRm.

Compliance criteria (required client actions):
- Maintain a detailed inventory of the feed used including:
  - Quantities used of each formulation;
  - Percentage of individual feed formulations used;
  - Source (country) of each formulation used;
  - Supporting documentation and signed declaration from feed supplier.

Compliance documents provided with the 9/02/16 SkA declaration include Appendix 4 - MH 13YC FFDR declaration (DH 31.18.10 v2) spreadsheet for FFDRm and FFDRo over the culture period Aug13 to Apr15. Cross check confirms results.

The client has submitted data/information to ASC.

d. The SkA (9/02/16) ASC Salmon Standard Compliance Declaration MH 2016 (DH 31.18.10 v2) for MH region 13YC (over the culture period Aug13 to Apr15) confirms that they can demonstrate evidence of traceability in regard to all feed ingredients (>1% of feed) for products fed to a complete production cycle.

Note: Individual raw materials can be traced and source fishery identified for each specific feed using the manufacturing order and Skretting’s internal Tracking and Tracing system. For the Purchasing period: Jan 2015-Dec 2015, the Skretting has an electronic traceability system which is described in their internal quality SOP Nutrace tracking and tracing: Purpose and responsibility including support (DMS-00028 R1 3/03/15). Skretting’s traceability system trace back to list for Skretting (SMS-0028 R1 3/03/15). The Global GAP Compound Manufactured Feed (GFM) Standard (v2.1) Chapter 13 has detailed provisions regarding traceability. Compliance documents provided with the 9/02/16 SkA declaration include Appendix 4 - MH 13YC FFDR declaration (DH 31.18.10 v2) spreadsheet for FFDRm and FFDRo over the culture period Aug13 to Apr15. Cross check confirms results.
Auditor Evaluation (Required CAB Actions):

B. Cross-check a sample of the farm's scores against the
Criterion 4.3 Source of marine raw materials

Footnote 4.2.2

[67] Publication: Refers to the date when the final standards and accompanying guidelines are completed and made publicly available. This definition of publication applies throughout this document.

[66] Meets ISEAL guidelines as demonstrated through full membership in the ISEAL Alliance, or equivalent as determined by the Technical Advisory Group of the ASC.

[70] Fishmeal and fish oil that are produced from trimmings can be excluded from the calculation as long as the origin of the... critically endangered, endangered or vulnerable in the IUCN Red List of Threatened Species (http://www.iucnredlist.org).

Requirement: FFDRo < 2.95 or

Indicator: FFDRo < 2.95 or EPA & DHA < 30 g/kg feed

Applicability: A3

A. Cross-check against 4.2.1a to confirm that client recorded a

B. Obtain a copy of the client’s letter of intent.

C. For option B, calculate FFDRo using formulas in Appendix IV-1 and using the factors calculated under 6.2a.

D. Verify that FFDRo calculations were done correctly and confirm the value complies with the standard.

E. Confirm that client has submitted FFDRo or EPA & DHA to ASC (Appendix IV)

F. Confirm that client has submitted FFDRo or EPA & DHA to ASC (Appendix IV)

Appendix 4 - NH-1PC FDR declaration (DH 31.18.10 v2) spreadsheet

Appendix 5 - 2015 Origin of Source Fishery for MF and FO (DH 31.18.07 x2)

Individual raw materials can be traced and source fisheries identified for each specific feed using the manufacturing order and Skretting’s internal Tracking and Tracing system. For the Purchasing period: Jan 2015-Dec 2015, the Reduction Fishmeal from Peru (Anchovy, 30% of 2015 Raw material purchases), Chile (Anchovy, 22%);

Trimming Fishmeal from Thailand (Skippack tuna, 10%, Yellowfin tuna, 15%), Stresso (Skippack tuna, 5%, Yellow tuna, 1%, Albacore (2%), Ecuador (Skippack tuna, 20%, Yellowfin tuna, 7%, Beye tuna, 0.1%) and Reduction Fish Oil from Chile (Anchovy, 57%) and India (Sardine, 44%).

These values are based on purchased raw materials that are available in SkA’s internal system, i.e. feeds made at the beginning or end of purchasing year may not include species in this list due to lead times of purchased marine raw materials.

All of the fish species are listed in Appendix 6 - 2015 Independent Marine Assessment Report (3/01/15, 89p) called the Irvine (2015), also refer 4.3.2a. The report includes assessments on both Trimming (2015) and fish oil, and whether they meet the requirements of the ASC Salmon Standard.

A. The SKA (9/02/16) ASC Salmon Standard Compliance Declaration MH 2016 (DH 31.18.10 x2) for MH region 13YC includes the compliance document Appendix 4 - NH-1PC FDR declaration (DH 31.18.10 v2) states that fish and fish oil, and whether meet the requirements of the ASC Salmon Standard.

B. Tassal’s ASC-FS-048 Responsible Sourcing Policy (F01/14, issue #1) includes the sourcing of feed made from fish products or fisheries with responsible environmental management.

C. Tassal email sent on 8/01/14 (signed by Head of Sustainability) to Skretting included a copy of the Salmon Standard and the Feed Supplier Notification Letter (1p) stating the requirement 4.3.1a Tassal intends to source feed from fisheries certified under the ASC Salmon Standard.

D. Tassal have noted that on or before June 13, 2017, they need to use feed inventory and feed supplier declarations in 4.2.1a to develop a list of the origin of all fish products used as feed ingredients. If they are unable to trace material back to feed supplier in this manner they cannot continue to be compliant.

E. Tassal have noted that on or before June 13, 2017, they need to use feed inventory and feed supplier declarations in 4.2.1a to develop a list of the origin of all fish products used as feed ingredients. If they are unable to trace material back to feed supplier in this manner they cannot continue to be compliant.

The Nutenco Sustainable Procurement Policy for Marine Products Version 2010 (4p) states that Skretting will continue to work globally to obtain sufficient sources, including by-products & trimmings from sustainability managed fisheries.

There continue to be evidence that Skretting is being proactive in working towards fulfilling all the ASC requirements, for example, in the Salmon Standard with ASC (‘ASC detailed questions 11-7.13, “ASC Response”’ 3 pages) they can expect IFFO RS to be the only realistic alternative for certified marine raw materials for quite some time. IFFO RS does not assess fisheries (as does MSC), but rather certifies that fishmeal and fish oil come from fisheries that meet the goal is to become compliant in the future.)

With the likely completion of the Feed Standard Dialogues, it is expected that this requirement will be modified. Skretting have assured Tassal they will comply with the criteria accordingly within the allowable timeframe.

Footnote 4.1 This standard and standard 4.3 applies to fishmeal and oil from forage fisheries, pelagic fisheries, or fisheries where the catch is directly reduced (including bycatch) and not to by-products or trimmings used in feed.

Footnote 5 The Feed Supplier Declaration for all feeds is stated in the Tassal Salmon Standard - 2015 (Appendix VI).

Footnote 6 This report is augmented by the Appendix 7 - Mass Balance - Skretting’s approach (DH 31.18.24 v0) and ASC Feed Certificates (SKA now issue ASC feed certificates for the entire Tassal operation; four certificates for the entire 2015-16 fiscal year).

Footnote 7 The feeds have guidelines as demonstrated through full membership in the ISEAL Alliance, or equivalent as determined by the Technical Advisory Group of the ASC.

Footnote 8 Publication refers to the date when the final standards and accompanying guidelines are completed and made publicly available. This definition of publication applies throughout this document.

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<td>Indicator: Timeframe for all fishmeal and fish oil used is derived to come from fisheries [64] certified under a scheme that is an ISEAL member [66] and has guidelines that specifically promote responsible environmental management of small pelagic fisheries.</td>
<td>Requirement: 5 years after the date of publication [70] of the ISEAL standards (i.e. full compliance by June 13, 2017) Appendix 4.3.1</td>
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D. If the species does not have a FishSource score then the fish feed does not comply with the requirement.

- Applicability: All, until June 12, 2017

- Indicators: For indicator 4.3.3 - Third-party verification of traceability

  Indicator 4.3.3 requires that farms show that their feed producers can demonstrate chain of custody and traceability as verified through third-party audits. Farms may submit reports from audits of feed producers to demonstrate this amount of feed is in compliance with the ASC Salmon Standard using principle 2 (mass balance). This invoice can be used in addition to the general information provided by Skretting to demonstrate this amount of feed is in compliance with the feed related criteria of the ASC Standard.

  SA has maintained annual Global GAP certification for Compound Manufactured Feeds (certification #66702637/661) since 2014 from IOS Australia. The next audit is scheduled for May 2017.

  The Global GAP CMM Standard, control point 15.3 states: "The origin of species of wild captured fish used to produce fishmeal and fish oil triable with regards to: Species of origin Country of origin - to the producer able to demonstrate that the list of species used for the production of fishmeal and fish oil does not contain species classified as critically endangered or endangered in the IUCN Red List at the time of purchase."

  This has been recorded complaint for the past two certifications.

  b. The SA (9/02/16) ASC Salmon Standard Compliance Declaration MH 2016 (DH 31.13.10 X2) for MH region 116C notes the evidence is assessed during the annual Global GAP certification for Compound Manufactured Feed and 4.2.2.

  c. Tassal continues to work with Skretting for full compliance with the feeds it uses. The Irvine (2015) Independent raw material assessment report commissioned annual by SkA includes the FishSource & Biomass (MI) scores for all of the fish species.

  d. A list of the species is not on the website it means that a FishSource assessment is not available. Client can then take one or both of the following actions:

     a. Contact FishSource via Sustainable Fisheries Partnerships to identify the species as a priority for assessment.

     b. Contract a qualified independent third party to conduct the assessment using the FishSource methodology and provide the assessment and details as the third party qualifications to the CAB for verification.

  - Applicability: All, until June 12, 2017

  - Requirement: All individual scores 4.3.4, and biomass score 6.4

B. Verify that demonstration of third-party verified chain-of-custody is in place for all species used.

- Applicability: All, until June 12, 2017

- Requirement: Yes

4.3.4 The International Union for the Conservation of Nature reference can be found at http://www.iucnredlist.org/static/introduction.
**Auditor Evaluation (Required CAB Actions):**

- Verify that farm notifies feed suppliers.
- Obtain from each feed manufacturer a copy of the manufacturer’s responsible sourcing policy for feed ingredients showing how the company comply with recognized crop moratoriums and local laws.
- Obtain from each feed manufacturer a copy of the manufacturer’s responsible sourcing policy for feed ingredients showing how the company comply with recognized crop moratoriums and local laws.
- Review policies from each feed supplier to confirm required sourcing policies in place.
- Confirm the farm and feed supplier(s) (4.4.1a) show evidence that supplier’s responsible sourcing policies are implemented.

**Criterion 4.4 Source of non-marine raw materials in feed**

**Footnote 4.4.1** The buyer [79] of the salmon of 2017 requires all, after June 13, 2017, for Responsible Soy (RTRS) or equivalent that are certified by the Roundtable for Responsible Soy, soy or soya-derived feed ingredients.

**Requirement:** 100%, within five years.

**Indicator:** Presence and evidence of a responsible sourcing policy for feed ingredients that comply with recognized crop moratoriums (74) and local laws (75).

**Applicability:** A3

**Footnote 4.4.2** Specifically, the policy shall include that vegetable ingredients, or products derived from vegetable ingredients, that are certified by the Roundtable for Responsible Soy (RTRS) or equivalent.

**Footnote 4.4.3** Moratorium: A period of time in which there is a suspension of a specific activity until future events warrant a resumption of the suspension or issues regarding the activity have been resolved. In the context, moratoriums refer to suspension of the growth of defined agricultural crops in defined geographical regions.

**Footnote 4.4.4** Soy protein concentrate SAK knew the country of origin of their SPC is Brazil, but they currently do not request information from their supplier on what region the soya was grown. The ASC response was that country of origin is acceptable.

**Footnote 4.4.5** All of SAK rendered raw materials (i.e. poultry meal, feather meal, blood meal, meat meal, poultry oil) are only sourced from Australian suppliers accredited with the Australian Renderers Association. Their documentation confirms that all their raw materials were sourced from farms that are compliant with the quality assurance declaration (DH 31.12.01 v4) that includes information on certifications for quality, feed safety, composition of aquaculture feeds, GM status of aquaculture feeds and antibiotics & hormones in aquaculture feed.

**Footnote A.** Reference the document Nutreco Supplier Code of Conduct (MMR-00519 R1 11/12/15) as the source of this requirement.

**Footnote B.** Reference the document Nutreco Sustainable Procurement Policy for Marine Products Version 2010 (9/11/12) and the 09.05.03 Sustainability Criteria soy products (9/11/12) have been replaced by the SOP Nutreco Supplier Code of Conduct (MMR-00519 R1 11/12/15).

**Footnote C.** Reference the document Quality Assurance Declaration (DH 31.12.01 v4) that includes information on certifications for quality & food safety, composition of aquaculture feeds, GM status of aquaculture feeds and antibiotics & hormones in aquaculture feed.
4.4.1 Energy consumption and greenhouse gas emissions on farms [46]

Instruction to Clients for Indicator 4.6.1 - Energy Use Assessment

Indicator 4.6.1 requires that farms must have an assessment to verify energy consumption. The scope of this requirement is restricted to operational energy use for the farm site(s) that is applying for certification. Boundaries for operational energy use should correspond to the source of Scope 1 and Scope 2 emissions (see Appendix V-1). Energy use corresponding to Scope 3 emissions should be included in energy use assessments across the board in the company.

The purpose of calculating energy consumption, the definition of the production cycle, and the interpretation of the energy consumption data vary depending on the energy source, the type of farm, and the region. The energy consumption data should be measured consistently with best practice in the area. Depending on the methodological approach, GHG emissions can be calculated by direct measurements, modeling, or using default values. The results for 2014/15 were used for the Sustainability Report 2015 (p42) for the entire Tassal Group with the following improvements: It is based on the principles outlined in the Greenhouse Gas Protocol Corporate Standard (WRI and WBCSD, 2004). 

4.4.1.1 Compliance Criteria (Required Client Actions)

- Maintain records of energy consumption by source (fuel, electricity, etc.) on the farm throughout each production cycle.
- Verify that the farm maintains records for energy consumption for each production cycle.
- Calculate the farm's total energy consumption in kilojoules (kJ) during the production cycle.
- Verify that the farm's calculations for completeness and accuracy have been done in compliance with the production cycle.
- Confirm that the farm accurately reports the total weight of fish produced during the production cycle.
- Confirm that the farm has submitted energy use calculations to SAD (Appendix V-1).
- Ensure that the farm has undergone an energy use assessment verifying the farm's energy consumption.

Auditor Evaluation (Required CAB Actions)

- Review the farm's calculations for completeness and accuracy.
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4.4.2 Energy consumption and greenhouse gas emissions on farms [47]

Instruction to Clients for Indicator 4.6.2 - Annual GHG Assessment

Indicator 4.6.2 requires that farms must have an annual Greenhouse Gas (GHG) assessment. Detailed instructions are presented in Appendix V-1 and references therein. The scope of this requirement is restricted to operational boundaries for the farm site(s) that is applying for certification. However, the SAD Steering Committee encourages companies to integrate GHG accounting as part of their Transparency of Farm Level Performance reporting, this includes the use or non-use of transgenic feed ingredients.

Tassal has acknowledged its responsibility to disclose to the buyer(s) a list of any transgenic plant raw material in the feed and maintain documentary evidence of this disclosure for > 6 months. They have noted the info from the 2013 Sustainability Report (p22) documented the Tasmanian moratorium on commercial GMOs. The 2015 Sustainability Report (p21, 23 &36) notes the use of non-GMO processes.

- Tassal makes annual submissions to ASC for each region as part of their Transparency of Farm Level Performance reporting, this includes the use or non-use of transgenic feed ingredients.

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</table>
4.6.2 Indicator: Records of greenhouse gas (GHG) (CO2e) emissions (i.e. GHG assessment, as outlined in Appendix V-1)

Requirement: Yes

Applicability: All farms except as noted in [89]

Compliance Criteria (Required Client Actions):

a. Maintain records of greenhouse gas emissions at the farm.

b. At least annually, calculate the scope 1 and scope 2 GHG emissions at the farm and evidence of an annual GHG assessment, as outlined in Appendix V-1.

c. For GHG calculations, select the emission factors which are best suited for the farm's operation. Document the source of those emission factors.

Note: If the farm owns or leases a net-cleaning facility that effluent treatment is in place, confirm that the facility has appropriate technologies in place to capture copper in effluents and that they function as intended.

Note: If the benthos throughout and immediately outside the full AZE is hard bottom, provide evidence to the CAB and request an exemption from Indicator 4.7.3 (see 2.1.1c).

Note: If yes to 4.7.2b, obtain evidence that effluent treatment used at the cleaning site is an appropriate technology to capture of copper in effluents.

d. Declare to the CAB whether copper-based treatments are used on farm, and confirm that nets are not cleaned as per Appendix V-1.

e. Inform ASC whether copper antifoulants are used on farm (yes or no)

F. Confirm that the farm has submitted on-farm calculations for feed to ASC (Appendix IV).

As a surveillance audit, the farm has received annual non-conformities, with several other criteria checked at random. The criteria was not evaluated during the 2016 surveillance audit.

4.6.3 Indicator: Documentation of GHG emissions of the feed (i.e. feed used during the previous production cycle, as outlined in Appendix V-1, subsection 4.7.3)

Requirement: Yes, within three years of the publication (36) of the SAD standards [P. 4. By June 13, 2015]

Applicability: All farms except as noted in [89]

Compliance Criteria (Required Client Actions):

a. Maintain records of greenhouse gas emissions on the farm.

b. GHG emissions must be recorded using recognized methods, standards and records as outlined in Appendix V.

c. GHG emissions from feed can be given based on the average raw material composition used to produce the salmon (by weight) rather than using feed composition on a lot-by-lot basis.

Note1: Feed supplier’s calculations must include Scope 1, Scope 2, and Scope 3 GHG emissions as specified in Appendix V, subsection 4.7.2.

Note2: Feed supplier’s calculations must include Scope 1, Scope 2, and Scope 3 GHG emissions as specified in Appendix V, subsection 4.7.3.

d. For GHG calculations involving commodities that are not grown to the standards, specify the Global Warming Potential (GWP) used and its source.

e. Submit results of feed calculations (6.2 to 86 as per Appendix V) at least once per year.

f. Confirm that the farm has submitted on-farm calculations to ASC (Appendix IV).

g. Ensure that the farm undertakes a self-assessment as outlined in Appendix V-1 at least annually.

As a surveillance audit, the farm has received annual non-conformities, with several other criteria checked at random. The criteria was not evaluated during the 2016 surveillance audit.

Footnote [87] Publication: Refers to the date when the final standards and accompanying guidelines are completed and made publicly available. This definition of publication applies throughout this document.

Footnote [88] GHG emissions from feed can be given based on the average raw material composition used to produce the salmon (by weight) rather than using feed composition on a lot-by-lot basis.

Footnote [89] Closed production systems that do not use nets and do not use antifoulants shall be considered exempt from standards under Criterion 4.7.

Footnote [90] See Appendix VI for transparency requirements for 4.7.1, 4.7.3 and 4.7.4.

Footnote [91] Under the SAD, “copper-treated net” is defined as a net that has been treated with any copper-containing substance as per Appendix V-1 at least annually.

Footnote [92] Note: If the farm maintains records of GHG emissions, the farm must explain what analyses must be done by feed suppliers; and

Footnote [93] Indicator 4.6.3 requires that farms document the greenhouse gas emissions (GHG) associated with any feeds used during salmon production. Farms will need to obtain information from their feed supplier(s) and thereafter maintain a continuous record of feed GHG emissions throughout all production cycles. This requirement takes effect on June 13, 2015 and it will apply across all farms, regardless of size. Specifically, the IC recommends that, for the purposes of this standard, if the farm provides information to its feed supplier(s) with detailed information about the requirements including a copy of the methodology outlined in Appendix V, subsection 4.7.2, the farm must explain what analyses must be done by feed suppliers, and the farm must explain how feed suppliers are required to document evidence will be required by the farm to demonstrate compliance.

Note: Firms may calculate GHG emissions of feed using the average raw material composition used to produce the salmon (by weight) rather than using feed composition on a lot-by-lot basis.

Footnote [94] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. The criteria was not evaluated during the 2016 surveillance audit.

Footnote [95] Footnotes must be indexed using recognized methods, standards and records as outlined in Appendix V.

Footnote [96] Footnotes must be indexed using recognized methods, standards and records as outlined in Appendix V.

As a surveillance audit, the farm has received annual non-conformities, with several other criteria checked at random. The criteria was not evaluated during the 2016 surveillance audit.

Criterion 4.7 Non-therapeutic chemical inputs (i.e. copper)

Compliance Criteria (Required Client Actions):

a. For farms that use copper-treated nets (i.e. evidence that nets are not cleaned [82] or treated in situ in the marine environment)

b. Confirm that the farm has informed ASC whether copper antifoulants are used on farm (yes or no)

c. Declare to the CAB whether copper-based treatments are used on farm, and confirm that nets are not cleaned as per Appendix V-1.

d. If scope 4.7.2b is not applicable, maintain records of greenhouse gas emissions for the volume of feed the farm uses in the prior production cycle.

e. For GHG calculations involving commodity that is not grown to the standards, specify the Global Warming Potential (GWP) used and its source.

Note: If the farm does not do any heavy cleaning of copper-treated nets in situ.

Note: If the farm has informed ASC whether copper antifoulants are used on farm (yes or no)

e. Inform ASC whether copper antifoulants are used on farm (yes or no)

f. Effective April 1, 2016, evidence of a net-cleaning facility that effluent treatment used at the cleaning site is an appropriate technology to capture of copper in effluents.

As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. The criteria was not evaluated during the 2016 surveillance audit.

Footnote [97] Indicator 4.7.2 requires that farms document the greenhouse gas emissions (GHG) associated with any feeds used during salmon production. Farms will need to obtain information from their feed supplier(s) and thereafter maintain a continuous record of feed GHG emissions throughout all production cycles. This requirement takes effect on June 13, 2015 and it will apply across all farms, regardless of size. Specifically, the IC recommends that, for the purposes of this standard, if the farm provides information to its feed supplier(s) with detailed information about the requirements including a copy of the methodology outlined in Appendix V, subsection 4.7.2, the farm must explain what analyses must be done by feed suppliers, and the farm must explain how feed suppliers are required to document evidence will be required by the farm to demonstrate compliance.

Footnote [98] Footnotes must be indexed using recognized methods, standards and records as outlined in Appendix V.

Footnote [99] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. The criteria was not evaluated during the 2016 surveillance audit.

Footnote [100] Footnotes must be indexed using recognized methods, standards and records as outlined in Appendix V.

As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. The criteria was not evaluated during the 2016 surveillance audit.

Footnote [101] Footnotes must be indexed using recognized methods, standards and records as outlined in Appendix V.
A. Review list of biocides and cross-check against treatment

Auditor Evaluation (Required CAB Actions):

Criterion 5.1 Survival and health of farmed fish [95]

PRINCIPLE 5: MANAGE DISEASE AND PARASITES IN AN ENVIRONMENTALLY RESPONSIBLE MANNER

Footnote

5.1.1 A fish health manager is someone with professional expertise in managing fish health, who may work for a farming company or for a veterinarian, but who does not necessarily have the authority to prescribe medicine.

5.1.2 A designated veterinarian is the professional responsible for health management on the farm who has the legal authority to diagnose disease and prescribe medicine. In some countries such as Norway, a fish health biologist or other professional has equivalent professional qualifications and is equivalent to a veterinarian for purposes of these standards. This definition applies to all references to a veterinarian throughout the Code.

Applicability:

All farms except as noted in [96] and excluding those farms shown to be exempt from indicator 5.1.4 (as per 4.7.3A)

Indicator: Evidence that copper levels [4] are < 58 mg Cu/kg dry sediment weight

A. Review documentary evidence in Appendix I-1 (also see Indicator 2.1.1 and 2.1.2). B. If applicable, review evidence to confirm that farm followed Appendix I-1 for testing copper levels at reference sites.

Applicability:

All farms except as noted in [96] and excluding those farms shown to be exempt from indicator 5.1.4 (as per 4.7.3A)

Requirement: Yes

D. As applicable, review data to confirm that copper levels are < 34 mg Cu/kg dry sediment weight. If no, proceed to 4.7.4C.

Footnote

[4] According to testing required under 4.7.3. The standards related to testing of copper are only applicable to farms that use copper-based nets or copper treated nets.

PRINCIPLE 5: MANAGE DISEASE AND PARASITES IN AN ENVIRONMENTALLY RESPONSIBLE MANNER

Criteron 5.1 Survival and health of farmed fish [96]

Compliance Criteria (Required Client Actions): Compliance Criteria (Required Client Actions)

Audit Evaluation (Required CAB Actions)

Footnote

[6] See Appendix I-1 for transparency requirements for 5.1.4, 5.1.5 and 5.1.6.

Indicator: Evidence of a fish health management plan

A. Obtain and review the farm's fish health management plan.

Applicability: All farms except as noted in [96]

Requirement: Yes

D. As applicable, review data to confirm that copper levels are < 34 mg Cu/kg dry sediment weight. If no, proceed to 4.7.4C.

5.1.2.1 Indicator: Site visits by a designated veterinarian [96] at least once a month and by a fish health manager [97] at least once a month

A. Maintain records of visits by the designated veterinarian and fish health managers [97]. If schedule cannot be met, a risk assessment must be provided.

Applicability: All farms except as noted in [96]

Requirement: Yes

5.1.2.2 Indicator: Corrective actions in 5.1.2a were performed by the farm's designated health professionals.

A. Maintain records of the qualifications of persons identified in 5.1.2b.

Applicability: All farms except as noted in [96]

Requirement: Yes

5.1.3 Indicator: Indicator 5.1.3 is applicable to the client

A. Review documentary evidence in Appendix I-1 for each production cycle.

Applicability: All farms except as noted in [96] and excluding those farms shown to be exempt from indicator 5.1.4 (as per 4.7.3A)

Requirement: Yes

4.7.3 Indicator: Evidence of responsible disposal of mortalities

A. Maintain records of mortality removals to show that dead fish are removed regularly and disposed of in a responsible manner.

Applicability: All farms except as noted in [96]

Requirement: Yes

5.1.4 Indicator: Review list of biocides and cross-check against treatment

A. Declare to the CAB whether the farm uses copper-based nets or copper treated nets. (See also 4.7.1c). If "no", indicator 5.1.3 does not apply.

Applicability: All farms except as noted in [96]

Requirement: Yes
Footnote (38) The SAC recognizes that not all mortalities will result in dead fish present for collection and removal. However, such situations are considered the exception rather than the norm.

Footnote (99) If on-site diagnosis is inconclusive, this standard requires off-site laboratory diagnosis. A qualified person must confirm that post-mortem analysis(s) were done by qualified individuals or labs.

A. Review records of mortalities to verify completeness and to confirm that post-mortem analyses were done by qualified individuals or labs. A review of mortality records for the most recent full production cycle immediately prior to the current cycle. If rate was ≤ 6%, then the farm must satisfy the requirement of 5.1.3c. 5.1.4a, b, c, d, and e. Provide additional evidence to show how farm records in 5.1.4a-d are reasonable and based on historical data.

B. Review records to confirm the farm had post-mortem analyses done for each mortality event and that a statistically relevant number of fish were analyzed from each mortality event. The review of the farm’s post-mortem analysis results for each mortality event (5.1.3c).

C. Review records to confirm that on-site diagnosis were sent to off-site laboratory for further testing.

D. Review records to confirm the farm had post-mortem analyses done for each mortality event and that a statistically relevant number of fish were analyzed from each mortality event.

E. Review records to confirm the on-site diagnosis were reasonable and consistent with results from post-mortem analyses. Where cause was not determined verify that classification was plausible given available data.

F. Confirm that client has submitted data from post-mortem analyses and cause and number of mortalities to ASC (Appendix VI).

G. Confirm that farm has submitted data on maximum unexplained mortality to ASC as per calculation must cover one full production cycle immediately prior to the current cycle. If rate was ≤ 6%, then the farm must satisfy the requirement of 5.1.3c.

H. Calculate the total number of mortalities that were diagnosed (see 5.1.3a) as being related to viral disease. The spreadsheet Macquarie Harbour 13YC mortality classification provides data on UEM. The data shows that unexplained mortalities were greater than 6% but less than 40%.

Note: Farms must provide a full production cycle classification based on the cumulative database from the current and previous two production cycles (as needed).

To continually improve fish welfare across all marine sites and hatcheries, since FY2014, Tassal developed and implemented a new framework to better support fish health and welfare: Tassal uses “Fishtalk” to record removals based on the mortalities recorded by divers and farm staff – these are summarised in the spreadsheet Macquarie Harbour 13YC mortality classification.

Footnote (40) The SAC recognizes that not all mortalities will result in dead fish present for collection and removal. However, such situations are considered the exception rather than the norm.

Footnote (52) The new Mortality Extraction System soon to be on each pen will mean this being addressed, farm staff are expected able to get to more pens quickly so that morts are recovered daily rather than every 2-3 days by divers. This will reduce the number of unexplained mortalities.

As detailed above in 3.4.3 Estimated Unexplained Losses, the FPM-T commented that the main reason for the high EUL was from the decomposition of morts before recovery, especially when higher water temperatures cause mortalities falling under the EUL categories. As of 1/12/14, Tassal have implemented changes in procedures to determine mortalities faster, before fish decompose, (new recording sheet for mortalities MOD-230). Changes include: the new sheet has 6 categories in 14 vs the old 1. New instructions have been sent to divers, health officers and regional managers.

The new Mortality Extraction System soon to be on each pen will mean this being addressed, farm staff are expected able to get to more pens quickly so that morts are recovered daily rather than every 2-3 days by divers. This determined.

The estimated unknown mortality is expected to improve with significantly lower figures recorded.

Data was submitted to ASC.

Footnote (99) If on-site diagnosis is inconclusive, this standard requires off-site laboratory diagnosis. A qualified person must confirm that post-mortem analysis(s) were done by qualified individuals or labs.

A. Review records of mortalities to verify completeness and to confirm that post-mortem analyses were done by qualified individuals or labs. A review of mortality records for the most recent full production cycle immediately prior to the current cycle. If rate was ≤ 6%, then the farm must satisfy the requirement of 5.1.3c. 5.1.4a, b, c, d, and e. Provide additional evidence to show how farm records in 5.1.4a-d are reasonable and based on historical data.

B. Review records to confirm the farm had post-mortem analyses done for each mortality event and that a statistically relevant number of fish were analyzed from each mortality event.

C. Review records to confirm the on-site diagnosis were reasonable and consistent with results from post-mortem analyses. Where cause was not determined verify that classification was plausible given available data.

D. Review records to confirm the on-site diagnosis were reasonable and consistent with results from post-mortem analyses. Where cause was not determined verify that classification was plausible given available data.

E. Review records to confirm the on-site diagnosis were reasonable and consistent with results from post-mortem analyses. Where cause was not determined verify that classification was plausible given available data.

F. Confirm that client has submitted data from post-mortem analyses and cause and number of mortalities to ASC (Appendix VI).

G. Confirm that farm has submitted data on maximum unexplained mortality to ASC as per calculation must cover one full production cycle immediately prior to the current cycle. If rate was ≤ 6%, then the farm must satisfy the requirement of 5.1.3c.

H. Calculate the total number of mortalities that were diagnosed (see 5.1.3a) as being related to viral disease. The spreadsheet Macquarie Harbour 13YC mortality classification provides data on UEM. The data shows that unexplained mortalities were greater than 6% but less than 40%.

Note: Farms must provide a full production cycle classification based on the cumulative database from the current and previous two production cycles (as needed).

To continually improve fish welfare across all marine sites and hatcheries, since FY2014, Tassal developed and implemented a new framework to better support fish health and welfare: 1. Internal audit on fish welfare standards

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To continually improve fish welfare across all marine sites and hatcheries, since FY2014, Tassal developed and implemented a new framework to better support fish health and welfare: 1. Internal audit on fish welfare standards
### Audits Evaluation (Required CAB Actions):

**C. Cross-check records of therapeutant use (5.2.1a) against the list of banned therapeutants.**

- Interviewees wish to confirm their understanding of exclusions from the classification, and annual targets for reduction (see S.1.1, S.1.2).

**Footnote:**
- [101] See Appendix VI for transparency requirements for 5.2.1, 5.2.5, 5.2.6 and 5.2.10.
- [102] Chemicals used for the treatment of fish.
- [103] “Banned” means proactively prohibited by a government entity because of concerns around the substance. A banned antibiotic is a substance that is proactively banned for use in food fish for the primary salmon producing or importing countries listed in [104].
- [104] For purposes of the standard, those countries are Norway, the UK, Canada, Chile, the United States, Japan and France.

### Compliance Criteria (Required Client Actions)

#### Footnote:
- [105] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

#### Footnote:
- [106] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

#### Footnote:
- [107] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

#### Footnote:
- [108] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

### Indicators S.2.1.2 - Records Related to Therapeutic Treatments

<table>
<thead>
<tr>
<th>Indicator</th>
<th>On-farm documentation that includes, at a minimum, detailed information on all chemical and therapeutant use. Those records maintained for compliance with 5.2.1, if all consolidated into a single place, can be used to demonstrate performance against subsequent indicators (S.2.1 through S.2.10) under Criteria S.2.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Requirement</td>
<td>None</td>
</tr>
<tr>
<td>Applicability</td>
<td>All</td>
</tr>
</tbody>
</table>

- Review the farm’s fish health management plan to confirm inclusion of withholding periods and interview farm staff to verify implementation.
- Review farm management communication with the veterinarian, fish health manager, and staff about annual targets and planned actions to meet targets.
- Validate prescriptions for antibiotic use in a detailed application from the veterinarian (or equivalent, see [96] for definition of veterinarian).
- Maintain records of chemical and therapeutant use that includes:
  - name of the veterinarian prescribing treatment;
  - product name and chemical name;
  - reason for use (specific disease);
  - class of treatment;
  - amount(s) of product used;
  - dosage;
  - name of the veterinarian prescribing treatment.
  - the WHO classification of antibiotics (see note under 5.2.8); and
  - the supplier of the chemical or therapeutant.

### Compliance Criteria (Required Client Actions)

#### Footnote:
- [109] See Appendix VI for transparency requirements for 5.2.1, 5.2.5, 5.2.6 and 5.2.10.

#### Footnote:
- [110] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

#### Footnote:
- [111] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

#### Footnote:
- [112] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

#### Footnote:
- [113] As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

### Indicators S.2.2.4 - Compliance with all withholding periods after treatments

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Compliance with all withholding periods after treatments.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Requirement</td>
<td>None</td>
</tr>
<tr>
<td>Applicability</td>
<td>All</td>
</tr>
</tbody>
</table>

- Review farm’s fish health management plan to confirm inclusion of withholding periods and interview farm staff to verify implementation.
- Review farm’s fish health management plan to confirm inclusion of withholding periods and interview farm staff to verify implementation.
- Ensure that farm management communication with the veterinarian, fish health manager, and staff about annual targets and planned actions to meet targets.
- Interviewees wish to confirm their understanding of exclusions from the classification, and annual targets for reduction (see S.1.1, S.1.2).
Note: **treatment** is a single course of medication given to address a specific disease issue and that is likely to last a number of days and be applied in one or more pens (or cages).

**5.2.6**

**Applicability:** None

- If the farm uses any antibiotic listed as critically important (5.2.8a) to treat any fish during the current production cycle, inform the CAB prior to the start of the fish farm's production cycle, and how the farm will ensure full traceability and separation of treated fish through and post-harvest.
- Maintain a detailed log of all medication-related events (see also 5.2.1a).
- Review farm purchase records and calculate total amount procured and how the farm will ensure full traceability and separation of treated fish.
- Calculate the total amount of treatments of antibiotics used during the current and prior production cycles (see also 5.2.1a).

**5.2.7**

**Applicability:** None

- The designated veterinarian must verify that all loggerhead drummers present before proceeding with treatment.
- Calculate the total number of treatments of antibiotics used during the current and prior production cycles and supply a written statement of this calculation.
- Confirm that the client used a record of treatments of antibiotics used during the most recent production cycle.

**5.2.8**

**Applicability:** All farms with a cumulative PTI ≥ 6 in the most recent production cycle. If not, then the calculation of cumulative PTI (Appendix VI) does not apply. If yes, then proceed to 5.2.10B.

- If the farm has not used any antibiotics listed as critically important (5.2.8a) to treat any fish during the current production cycle, inform the CAB prior to the start of the fish farm's production cycle, and how the farm will ensure full traceability and separation of treated fish through and post-harvest.

**5.2.9**

**Applicability:** All farms with a cumulative PTI ≥ 6 in the most recent production cycle.

- Review the farm's cumulative PTI score to determine if indicator 5.2.8 is applicable. If no, then indicator 5.2.10 does not apply.

**5.2.10**

**Applicability:** All farms with a cumulative PTI ≥ 6 in the most recent production cycle.

- Review the farm's calculations to verify that the PTI score was calculated correctly and that the scores are accurate. Cross-check with records of parasiticide use.

As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

**Footnote:** (Appendix VI).

As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

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As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.
5.2.10. Indicator: Prevention of documents demonstrating that the farm has provided buyers (112) of its smolt inputs have been recorded. (see 4.4.3b).

- Review farm records to confirm recording of all successions of medicinal treatments.

- A. Review farm records for determining resistance are ineffective or unsuitable; the farm shall have samples analyzed by an independent laboratory to determine resistance formation. The auditor shall record in the audit report whether field-based bio-assays were deemed ineffective and shall include results from the laboratory analyses of resistance formation.

5.3.2. Indicator: When bio-assay test results indicate formation of resistance against a particular treatment, the farm is required to perform bio-assays to determine whether the resistance has formed. If yes, proceed to 5.3.2b; if no, then Indicator 5.3.2 is not applicable.

- Review evidence from bio-assay tests to determine whether the resistance has formed. Confirm that bio-assays were performed by a qualified independent laboratory.

5.3.3. Indicator: When bio-assay tests show evidence that resistance has formed, keep records showing that the farm took one of two actions:

- a. Keep records of the start and end dates of periods when the site is immediately harvested or killed all fish on site.

- b. Calculate antibiotic load (antibiotic load = the sum of the total amount of active ingredient of antibiotic used in kg) for most recent production cycle and for the two previous production cycles. For first audit, calculations must cover one full production cycle immediately prior to the gap specified.

5.4.1. Indicator: Evidence that all salmon on the site are from a single-year class.

- A. Review farm records to confirm recording of all successions of medicinal treatments.

5.4.4. Indicator: Farm sites that have closed, contained production units where there is complete separation of water between units and no sharing of filtration systems or other systems that could spread disease, or:

- a. Review evidence to confirm that the farm has undertaken creditable measures to determine whether or not it had an identifiable transmissible agent.

5.4.5. Indicator: Farm sites that have closed, contained production units where there is complete separation of water between units and no sharing of filtration systems or other systems that could spread disease, or:

- a. Review evidence to confirm that the farm has undertaken creditable measures to determine whether or not it had an identifiable transmissible agent.
5.4.3 To demonstrate compliance with Indicator 5.4.2, clients have the option to describe how farm practices are consistent with the intentions of the OIE Aquatic Animal Health Code by developing relevant policies and procedures and integrating them into the farm's fish health management plan. To demonstrate compliance with Indicator 5.4.3, clients have the option to describe how farm practices are consistent with the intentions of the OIE Aquatic Animal Health Code by developing relevant policies and procedures and integrating them into the farm's fish health management plan.

**Instruction to clients for Indicator 5.4.3 - Compliance with the OIE Aquatic Animal Health Code**

**Applicability:** All

**Requirement:** No

- Aid compliance with the OIE Aquatic Animal Health Code by developing relevant policies and procedures and integrating them into the farm's fish health management plan.
- Aid the farm in identifying gaps between its current fish health management practices and the requirements of the OIE Aquatic Animal Health Code.

**Evidence of compliance (120) with the OIE Aquatic Animal Health Code (121)**

**Requirement:** No

- Aid compliance with the OIE Aquatic Animal Health Code by developing relevant policies and procedures and integrating them into the farm's fish health management plan.
- Aid the farm in identifying gaps between its current fish health management practices and the requirements of the OIE Aquatic Animal Health Code.

**Instruction to clients for Indicator 5.4.4 - Reporting of OIE-notifiable diseases on farms**

**Applicability:** All

**Requirement:** No

- Aid the farm in identifying gaps between its current fish health management practices and the requirements of the OIE Aquatic Animal Health Code.
- Aid the farm in identifying gaps between its current fish health management practices and the requirements of the OIE Aquatic Animal Health Code.

**Evidence that workers have access to trade unions (if they exist) and are union representatives**

**Requirement:** No

- Aid workers to join unions or represent their interests in the workplace.
- Aid the farm in identifying gaps between its current fish health management practices and the requirements of the OIE Aquatic Animal Health Code.
Employers shall have written anti-discrimination policies stating that the company does not engage in or support discrimination on race, nationality, colour or ethnic origin; religion, disability, gender, sexual orientation, union membership, age or any other condition that may give rise to discrimination.

**Criterion 6.2 Child labor**

- **Compliance Criteria**
  - In countries where the legal minimum age for employment is 15 years, there are two possible exceptions:
    - The farm operates in a country where the legal minimum age is set higher than 15 years, in which case the minimum legal age of the farm is followed.
    - The farm operates in a country where the legal minimum age is not 15, then the employer shall maintain documentation attesting to this fact.
  - If the farm operates in a country where the legal minimum age of workers is set lower than 15, then the employer shall maintain documentation attesting to this fact.
  - Minimum age of permanent workers is 15 or older (except as noted above).
  - If the farm operates in a country where the legal minimum age of workers is set lower than 15, then the employer shall maintain documentation attesting to this fact.

**Footnote**

- Any work by a child younger than the age specified in the definition of a child.

- Child: Any person under 15 years of age. A higher age would apply if the minimum legal age of workers is set lower than 15.

- Child Labor: Any work by a child younger than the age specified in the definition of a child.

- Bonded labor: When a person is forced by the employer or creditor to work to repay a financial debt to the crediting agency.

- Hazardous work: Work that, by its nature or the circumstances in which it is carried out, is likely to harm the worker's health (e.g., heavy lifting disproportionate to a person's body size, operating heavy machinery, exposure to toxic chemicals).

- Hazard: The inherent potential to cause injury or damage to a person's health (e.g., unequipped to handle heavy machinery safely, and unprotected exposure to harmful chemicals).

- Protected: Workers between 15 and 18 years of age will not be exposed to hazardous health and safety conditions; work on floating cages in poor weather conditions shall be considered hazardous.

- Young Worker: Any worker between the age of a child, as defined above, and under the age of 18.

**Criterion 6.3 Forced, bonded or compulsory labor**

- **Compliance Criteria**
  - Employees are not required to stay in job to repay debt.
  - Employer does not withhold any part of workers' salaries, benefits, property or documents in order to oblige them to continue working for employer.
  - Employees are not required to stay in job to repay debt.
  - Employees maintain age records for employees that are sufficient to demonstrate compliance.

- **Applicability**
  - None

- **Requirement**
  - All

- **Indicator**
  - Number of incidences of forced, bonded or compulsory labor

- **Footnote**

  - The auditor reviewed employment contracts and interviewed several staff, all confirming that no incidences of forced, bonded or compulsory labor is in place. Staff were familiar with and fully understood their contracts. They result in disciplinary measures. By way of interviews with the Human Resources department, the auditor confirmed that only photocopies of identification documents are retained.

- **Criterion 6.4 Discrimination**

  - **Compliance Criteria**
    - The company has a comprehensive policy which prohibits any form of harassment, bullying and discrimination.
    - The policy explicitly protects employees from discrimination or harassment based on:
      - Race, nationality, colour or ethnic origin;
      - Religion, disability, gender, sexual orientation, union membership, age or any other condition that may give rise to discrimination.
    - The procedure related is covered through training and requires prompt action any breaches of the aforementioned policy in a confidential manner.

- **Indicator**
  - Evidence of comprehensive [126] and proactive anti-discrimination policies, procedures and process

- **Requirement**
  - All

- **Applicability**
  - All

- **Footnote**

  - Employees shall have written anti-discrimination policies stating that the company does not engage in or support discrimination in hiring, remuneration, access to training, promotion, termination or retirement based on race, caste, national origin, religion, disability, gender, sexual orientation, union membership, political affiliation, age or any other condition that may give rise to discrimination.
Criterion 6.7 Contracts (labor) including subcontracting

Compliance Criteria

Applicability: All

Indicator: Percentage of workers trained in health and safety practices, procedures (134) and policies on a yearly basis

- Employer keeps written documentation of training. The training includes an emergency response procedures and emergency response actions taken when necessary. (before overtime and bonuses)
- Employer demonstrates how they have taken steps toward paying a basic needs wage to their workers.
- Evidence of employer responsibility and a proof of insurance (accident or injury) for 100% of worker costs in a job-related accident or injury when not covered under national law.
- Employee has documented practices, procedures (including emergency response procedures) and policies to protect employees from workplace hazards and to minimize risk of accident or injury. The information shall be available to employees.
- The auditor interviewed the OH&S Manager at the farm who showed the tracking system for all OH&S incidents, which was complete. For any incidents, records are maintained and preventative actions are taken.

Applicability: All

Requirement: Yes

Applicability: All

Requirement: Yes

Applicability: All

Requirement: Yes

Applicability: All

Criterion 6.6 Wages

Compliance Criteria

Applicability: All

Indicator: The percentage of workers whose basic wage (136) is greater than or equal to the minimum wage (137)

- Employer keeps records of farm diving operations and a list of all personnel involved. In case an external service provider was hired, a certificate, or proof of insurance (accident or injury) for 100% of worker costs in a job-related accident or injury when not covered under national law.
- Employee maintains documentation to confirm that all personnel are provided full(reference information about fee structure and qualifications) or free legal representation to workers.
- Employer demonstrates how they have taken steps toward paying a basic needs wage to their workers.
- Evidence of employer responsibility and a proof of insurance (accident or injury) for 100% of worker costs in a job-related accident or injury when not covered under national law.
- Employee has documented practices, procedures (including emergency response procedures) and policies to protect employees from workplace hazards and to minimize risk of accident or injury. The information shall be available to employees.

Applicability: All

Requirement: Yes

Applicability: All

Requirement: Yes

Applicability: All

Requirement: Yes

Criterion 6.5 Work environment, health and safety

Compliance Criteria

Applicability: All

Indicator: Number of incidences of discrimination: (read more)

- Employer maintains a record of all discrimination complaints. These records do not show evidence for discrimination.
- Employer maintains a record of all discrimination complaints. These records do not show evidence for discrimination.
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- Employer maintains a record of all discrimination complaints. These records do not show evidence for discrimination.
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Applicability: All

Requirement: None

Applicability: All

Requirement: None

Applicability: All

Requirement: None

Applicability: All

Requirement: None

Applicability: All

Requirements: May be reviewed if available positions and there was no evidence to indicate any form of discrimination was taking place. This was additionally confirmed through a review of gender equality.
6.1.1 Employer maintains a record of all employment contracts.

6.10.1 Overtime is limited, and occurs in exceptional circumstances as evidenced by farm records (e.g. production records, time sheets, and other records of working hours).

6.11.1 Payment records (e.g. pay slips) show that workers are paid a premium rate for overtime hours.

6.13.1 If an employer requires employees to work shifts at the farm (e.g. 10 days on and six days off), the employer compensates workers with 1.5 times the regular wage for the 6 days off.

6.14.1 Workers are familiar with the company's labor conflict policies and procedures. There is evidence that workers have fair access.

6.2.1.1 Company has written policy for disciplinary action which explicitly states that its aim is to improve the worker’s physical and mental health or safety.

6.2.6.1 All complaints were responded to promptly, thus meeting the 90 day ASC requirement. As a result of the indicator being met, this has been designated as an observation due to the lack of documentation.

6.3.1.1 By way of human resource and staff interviews, the auditor confirmed that all employees have contracts with the company.

6.8.2 a. Employer does not use threatening, humiliating or punishing disciplinary practices that negatively impact a worker’s physical and mental health or safety.

6.9.1 a. Employer has written policy for disciplinary action which explicitly states that its aim is to improve the worker’s physical and mental health or safety.

6.10.2 a. Evidence of a policy to ensure social compliance of its suppliers and subcontractors.

6.13.2 a. Be advised that workers will be interviewed to confirm that there is no evidence for excessive or abusive disciplinary actions.

6.14.2 a. Employer has policy whose aim is to improve the worker’s physical and mental health or safety.

6.2.1 a. Employer has policy whose aim is to improve the worker’s physical and mental health or safety.

6.2.2 b. Worker grievances are addressed within 90 days.

6.4.1 a. Evidence of a policy with a focus on reduction in the worker’s exposure level. The policy and procedure exist and depend on the existence of early attempts to resolve issues. At the site visits, the risk outstanding issues exist. Some informal documentation exists regarding complaints and grievances, but this is primarily via email and not consolidated.

6.4.2 a. Employer has criteria for evaluating its suppliers and subcontractors. The company keeps a list of approved suppliers and subcontractors.

6.5.1 a. Employer maintains a record of all employment contracts.

6.6.1 a. Employer maintains a record of all employment contracts.

6.7.1 a. Employer maintains a record of all employment contracts.

6.8.1 a. Employer maintains a record of all employment contracts.
Voice their concerns about the nature of the farm's impacts. Continued consultations between farm and neighbors should create a forum where any key issue can be discussed and resolved.

The intent behind the ASC Salmon Standard is that the farm will identify all neighboring groups who are potentially impacted by its operations and work with them to minimize or mitigate any impacts. This includes indigenous groups. Effective community consultations are one of the best ways to identify such impacts to neighbors.

If the boundaries of indigenous groups have a defined legal status according to local or national law, it is the farm's responsibility to identify the group and establish a protocol with them. If the boundaries are undefined or unknown, there is no simple way to establish whether the farm is operating in close proximity to indigenous groups. Here ASC provides the following guidance.

The ASC Salmon Standard requires that farms must be respectful of the traditional territories of indigenous groups. The farm must consult with the local community at least twice every year (bi-annually). Consultations include participation by representatives from the local community who were consulted at the last meeting. Consultations also include communication about, or discussion of, the potential health risks of therapeutic treatments (see Indicator 7.1.1.3). Consultations must be documented, either in minutes, reports, or by recording that consultations comply with the above.

Be advised that representatives from the local community and organizations may be interviewed to confirm the above.

Evidence of a protocol for consulting with indigenous groups is required. All farms that operate in indigenous territories or on traditional lands of indigenous groups must establish a protocol with the local indigenous communities.

The company formulated a complaints procedure on 7/17/15 and a complaints policy was finalized corporate-wide prior to the end of this surveillance audit. The company documents and requests to all complaints an evidence of the mechanism for the presentation, treatment and resolution of complaints lodged by stakeholders, community representatives and organizations.

The company has a system for posting notifications at the farm during periods of therapeutic treatment. (Use of anesthetics) are not regarded as therapeutic treatments. The farm provides a mechanism for presentation, treatment and resolution of complaints lodged by stakeholders, community representatives and organizations.

The company has a protocol for handling complaints, including evidence of notification of stakeholders, reports to stakeholders describing actions taken, and evidence of resolutions of complaints. The company documents and responds to all complaints as evidence of proactive consultation with the local community.

Be advised that representatives from the local community, including committees where applicable, may be interviewed to confirm the above.

The company needed to treat its fish for 2 diseases in 2015. The auditor reviewed details and photos of signage used during these treatments which served as evidence of consultation with the community. The company involves local community members continuously to discuss concerns, answer questions, and ensure that all stakeholders have vehicle for communicating concerns to the company so that they may be addressed specific for tracking related issues around the Sharan community. This was a collaborative effort with other salmon farming companies operating in the area.

The company formalized a complaints procedure on 7/17/15 and a complaints policy was finalized corporate-wide prior to the end of this surveillance audit. The company documents and requests to all complaints an evidence of the mechanism for the presentation, treatment and resolution of complaints lodged by stakeholders, community representatives and organizations.

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Be advised that representatives from the local community, including committees where applicable, may be interviewed to confirm the above.
### Auditor Evaluation (Required CAB Actions):

- **Standards related to Principle 2**
- **Criterion 7.3 Access to resources**

- Footnote: Changes undertaken restricting access to vital community resources (e.g., without community approval) may be documented under 7.3.2.

### Compliance Criteria

<table>
<thead>
<tr>
<th>Requirement</th>
<th>Requirement</th>
<th>Auditor Evaluation (Required CAB Actions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>All Smolt Producers</td>
<td>Identify all of the farm’s suppliers. For each supplier, identify the type of smolt production system used (e.g., open, semi or closed systems) and submit this information to ASC (Appendix VI).</td>
<td>a. Verify that farm obtains declarations from suppliers affirms compliance with labor laws and regulations.</td>
</tr>
<tr>
<td></td>
<td>Review the farm’s list of suppliers. Confirm that the information submitted to ASC is consistent.</td>
<td>b. The hatcheries operate under FFL from inland fisheries. Local councils issue EPNs that form the requirements of water quality monitoring and reporting.</td>
</tr>
<tr>
<td></td>
<td>Where legal authorization related to water quality are required, obtain copies of supplier permits.</td>
<td>c. Comments from the Senior Manager – Freshwater and documents on regulations &amp; requirements include:</td>
</tr>
<tr>
<td></td>
<td>Obtain records from suppliers showing monitoring and compliance with discharge laws, regulations, and permit requirements.</td>
<td>- Comments from the Senior Manager – Freshwater and documents on regulations &amp; requirements include:</td>
</tr>
<tr>
<td></td>
<td>Verify that farm obtains all records to show that smolt suppliers comply with regulations on discharge and applicable permitting requirements related to water quality.</td>
<td>- Schedule 1 outlines conditions for the Environmental Protection Notice for both Rooswood Rd and Russell Falls in accordance with section 44(3) (EMP Act 1994).</td>
</tr>
<tr>
<td></td>
<td>Obtain declarations from smolt suppliers indicating they are in compliance with all labor laws and regulations.</td>
<td>- Comments from the Senior Manager – Freshwater and documents on regulations &amp; requirements include:</td>
</tr>
<tr>
<td></td>
<td>Submit these declarations to the farm.</td>
<td>- Schedule 1 outlines conditions for the Environmental Protection Notice for both Rooswood Rd and Russell Falls in accordance with section 44(3) (EMP Act 1994).</td>
</tr>
<tr>
<td></td>
<td>Verify that farm obtains all records to show that smolt suppliers comply with regulations on discharge and applicable permitting requirements related to water quality.</td>
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</tr>
</tbody>
</table>

### Section E: Standards for Suppliers of Smolt

#### Compliance Criteria (Required Client Actions):

- **Criterion 7.3a Access to resources**

- **Criterion 7.3b Access to community resources**

- **Criterion 7.3c Access to information**

#### Compliance Criteria (Required Supplier Actions):

- **Criterion 7.3a Access to resources**

- **Criterion 7.3b Access to community resources**

- **Criterion 7.3c Access to information**

#### Example of Compliance Criteria (Required Supplier Actions):

- **Criterion 7.3a Access to resources**

- **Criterion 7.3b Access to community resources**

- **Criterion 7.3c Access to information**

### Example of Compliance Criteria (Required Client Actions):

- **Criterion 7.3a Access to resources**

- **Criterion 7.3b Access to community resources**

- **Criterion 7.3c Access to information**

## Note

- Please refer to the ASC website for guidance on standards and compliance requirements. The ASC website contains comprehensive guidelines and resources for suppliers and clients to ensure compliance with the outlined standards.
**Indicator: Evidence of a commission by the farm of potential impacts on biodiversity and nearby ecosystems that contain the same components as the assessment for grow out facilities under 2.4.1.**

**Requirement:** Yes

**Applicability:** All Smolt Producers

---

**Instruction to Client for Indicator 8.4 - Calculating Total Phosphorus Released per Ton of Fish Produced**

Farms must confirm that each of their smolt suppliers comply with the requirement of indicator 8.4. This specifies the maximum amount of phosphorus that a smolt production facility can release into the environment per metric ton (mt) of fish produced over a 12-month period. The requirement is set at 5 kg/mt for the first three years from date of publication of the ASC Salmon Stewardship Code and 4 kg/mt for the fourth and subsequent years.

a. Smolt producers shall calculate the total amount of phosphorus released per ton of smolt produced during the past 12 months.

b. For all feeds used by the smolt suppliers (result from 8.4a), keep records showing phosphorus content as determined by chemical analysis or based on feed supplier declaration (Appendix VIII-1).

c. The sludge was properly disposed off-site and in accordance with the farm’s biosolid management plan.

**Note:** There is no maximum limit for sludge disposal.

---

**Instruction to Client for Indicator 8.4 - Calculating Total Phosphorus Released per Ton of Fish Produced**

Farms must confirm that each of their smolt suppliers comply with the requirement of indicator 8.4. This specifies the maximum amount of phosphorus that a smolt production facility can release into the environment per metric ton (mt) of fish produced over a 12-month period. The requirement is set at 5 kg/mt for the first three years from date of publication of the ASC Salmon Stewardship Code and 4 kg/mt for the fourth and subsequent years.

a. The farm has records of all feeds used by the smolt suppliers over the relevant time period.

b. The sludge was properly disposed off-site and in accordance with the farm’s biosolid management plan.

---

**Note:** There is no maximum limit for sludge disposal.

---

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**Note:** There is no maximum limit for sludge disposal.

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a. The farm has records of all feeds used by the smolt suppliers over the relevant time period.

b. The sludge was properly disposed off-site and in accordance with the farm’s biosolid management plan.

---

**Note:** There is no maximum limit for sludge disposal.
8.5. Auditor Evaluation (Required CAB Actions):

- Verify that the farm has evidence that their smolt suppliers do not produce non-native species. If the farm can show that their suppliers produce only native species, then indicator 8.5 does not apply.
- Provide the farm with documentary evidence that the farm complies with the requirement.
- If applicable, verify the farm has evidence from smolt suppliers confirming when the non-native species was first brought into the area before production.
- Review evidence to confirm that all smolt suppliers comply with the requirement.
- Verify that the farm retains evidence of compliance by all smolt suppliers.

8.6. Auditor Evaluation (Required CAB Actions):

- Review copy of Escape Prevention and Response Protocol (MO-146 Issue 4) that includes hatcheries (see page 6).
- Signed declaration (22/05/15) from Senior Manager FW Operations that Tassal and Saltas have not had any escapes from their hatcheries. There have been no escapes from the hatcheries since then.
- Acknowledged by Tassal - Tassal is a vertically integrated company from egg to plate. Tassal now conduct quarterly WQ monitoring and coordinate Benthic Macroinvertebrate reporting at the Saltas hatcheries. These record at least 10 years beginning 2015.
- N/A
- N/A
- N/A
- N/A

Summary: As significant progress has been made and there are limitations for implementing these corrective actions which will close the NC out entirely, this minor non-conformity has been extended for 12 months per ASC CA.
Auditor Evaluation (Required CAB Actions):

Standards related to Principle 4

8.8
8.7
(e.g., disposal and recycling)
biological waste from production
responsible treatment of non-
functioning policy for proper and

All Smolt Producers

Applicability:

Requirement:

number of fish
method used for calculating the
counting technology or counting

indicator of an annual GHG
the smolt production facility and

energy consumption at the smolt
use assessment verifying the

Accuracy shall be determined by the spec sheet for counting machines and through common estimates of error for hand-counts.

confirm that the supplier documents the source of the emissions
emission factors which are best suited to the supplier’s operation.

all scope 1 and scope 2 GHG emissions in compliance with Appendix V-1.
b. Confirm that, on at least an annual basis, the smolt supplier calculates total energy consumption on the supplier’s facility as required and the data is recorded as kilojoule/mt fish/production cycle.

c. Obtain records showing the accuracy of the counting technology used on site at stocking and harvest.

d. Confirm that the smolt supplier used results from 8.9b and 8.9c to calculate energy consumption on the supplier’s facility as required and the units are reported as kilojoule/mt fish/production cycle.

e. Obtain evidence to show that smolt supplier has undergone an energy use assessment verifying the supplier’s energy consumption.

As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

- Saltas hatcheries – Veolia (27/12/15) for 11 collections for total of 33m³
- Rookwood hatchery – Spectran fortnightly sludge removal invoice (2/10/15), Spectran Pump Fish waste Invoice (29/09/15) and Veolia general waste invoices.
- Tassal hatcheries – Veolia (27/12/15) for 11 collections for total of 33m³

Unlike the assessment made in 2013 which only accounted for the impacts associated with the direct use of these fuels using the NGERs methodology, this assessment is more comprehensive as it includes the inputs required to make the calculation. Tassal energy and GHG calculations for their reporting (e.g. Annual Sustainability report, etc.) is for financial year – for this report data is from FY14 which covers much of the 13YC production cycle.

Sometimes individual farm data for energy & GHG is not able to be determined, however the MI data is more relevant as it includes the three farms, all the vessels and the landbase operations and facilities.

Trends in the indices reported (kilojoule/mt fish/production cycle) can be compared between audit reports from year to year.

Calculations have been provided and reviewed by the auditor.

Confirm that the smolt supplier calculates total energy consumption in kilojoules (kJ) during the last production cycle.

Data for FY14:
- Stage of Production Energy Use (kJ) Explanation
- Total Hatchery 80,800; 99% from electricity

Calculations have been provided and reviewed by the auditor.

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Trends in the indices reported (kilojoule/mt fish/production cycle) can be compared between audit reports from year to year.

Calculations have been provided and reviewed by the auditor.
Footnote: (a) For the purposes of this standard, deaths are defined as the six deaths related to the Kyushu Posthatch outbreak.

Footnote: (b) Footnote 2.8.2.2.a. in the text allows for use of therapeutic treatments that include antibiotics or chemicals that are

Footnote: (c) Note: A “smolt group” is defined as a population that shares disease risk, including environment, husbandry, and host factors that might contribute to sharing disease agents for each group.

Footnote: (d) The Smolt vaccination declaration from the company vet (26/02/14) indicating that all fry are vaccinated with Yersinivac-B against Yersinia ruckeri. Fry destined for Macquarie Harbour are also vaccinated with Anguimons a

Footnote: (e) GHG emissions must be recorded using recognized methods, standards and records as outlined in Appendix V.

Footnote: (f) The Marquette Harbour Fish Health Management Plan - (MO-182 Issue 2) approved by the Tassal veterinarian, has a list of endemic and endemic diseases.

Footnote: (g) Tassal designated fish health veterinarian during development and have been reviewed and approved by the current Senior Manager – Fish Health.

Footnote: (h) For the purpose of this standard, deaths are defined as the six deaths related to the Kyushu Posthatch outbreak.

Table 2.8.2.2.c. In reports on fish production losses, it is important to determine the proportion of losses due to disease and parasites. The following list of potential pathogens shows the diseases that are known to affect salmonids during the life cycle and in their environment.

Footnote: (i) See above, all available vaccines have been used for fish destined for Mills area.

Footnote: (j) GHG emissions must be recorded using recognized methods, standards and records as outlined in Appendix V.

Table 2.8.2.2.a. All Smolt Producers

Table 2.8.2.2.b. All Smolt Producers

Table 2.8.2.2.d. All Smolt Producers

Table 2.8.2.2.e. All Smolt Producers

Table 2.8.2.2.f. All Smolt Producers
8.21. All Smolt Producers

**Footnote**

[166] For purposes of this standard, those countries are Norway, the UK, Canada, Chile, the United States, Japan and France.

8.20. All Smolt Producers

**Footnote**

[165] The antibiotic treatment is applied to any portion of the pens or farms cited. Facilities that did not require treatment are not eligible for certification.

[167] Antibiotics or chemicals that are banned, critically and highly important for human medicine, were used on fish sold to a farm with ASC certification.

[168] For the most recent production cycle there were a total of 3 treatments at the Russell Falls hatchery. At Saltas 18 cohorts within the population of the two hatcheries (Florentine and Wayatinah) received an antibiotic treatment. There were no treatments at the Rozelwood hatchery.

8.19. All Smolt Producers

**Footnote**

[169] For the present version of the World Health Organization (WHO) Critically Important Antimicrobials for Human Medicine (12th Revision 2011) which has been supplied to its own and the Saltas Industries.

[170] Acknowledged by Tassal that they have informed their smolt suppliers that the antibiotics on the WHO list (B.17a) cannot be used on sold to a farm with ASC certification.

[171] The spreadsheet Antibiotic use - Freshwater

8.18. All Smolt Producers

**Footnote**

[172] The third edition of the WHO list of critically and highly important antimicrobials was released in 2008 and is available at http://www.who.int/medicines/services/resistance/AK3.pdf.

8.17. All Smolt Producers

**Footnote**


[174] The supplier's declarations were supported by policies and procedures in line with the OIE Aquatic Animal Health Code.

8.16. All Smolt Producers

**Footnote**

[175] The spreadsheet Antibiotic use - Freshwater

8.15. All Smolt Producers

**Footnote**

[176] A. Verify that farm has provided the smolt supplier with copies of the OIE Aquatic Animal Health Code.

[177] A. Confirm that the farm provided smolt supplier with the current copy of the WHO list of antibiotics.

8.14. All Smolt Producers

**Footnote**

[178] A. Obtain from the smolt supplier records of all treatments of antibiotics over the most recent production cycle.

[179] A. Obtain from the smolt supplier records of all treatments of antibiotics over the most recent production cycle.

8.13. All Smolt Producers

**Footnote**

[180] A. Review the smolt supplier's declaration and supporting policies and procedures from each of its smolt suppliers.

8.12. All Smolt Producers

**Footnote**

[181] A. Verify the supplier's policies and procedures are in compliance with the OIE Aquatic Animal Health Code.

8.11. All Smolt Producers

**Footnote**


8.10. All Smolt Producers

**Footnote**

[183] A. Verify that farm obtains required information from each smolt supplier.

8.9. All Smolt Producers

**Footnote**

[184] A. Verify that farm obtains company-level policies and procedures from each of its smolt suppliers and a declaration of compliance.

8.8. All Smolt Producers

**Footnote**

[185] A. Verify that farm obtains company-level policies and procedures and a declaration of compliance with the labor standards under 6.1-6.11.

8.7. All Smolt Producers

**Footnote**

[186] A. Obtain copies of the supplier's company-level policies and procedures that are relevant to demonstrate compliance with the OIE Aquatic Animal Health Code.

[187] A. Obtain copies of the supplier's company-level policies and procedures and a declaration of compliance with the labor standards under 6.1-6.11.

8.6. All Smolt Producers

**Footnote**

[188] A. Review the documentation and declaration from B.1.1a to verify that smolt supplier's policies and procedures are in compliance with the requirements of labor standards under 6.1-6.11.

[189] A. Review the documentation and declaration from B.1.1a to verify that smolt supplier's policies and procedures are in compliance with the requirements of labor standards under 6.1-6.11.

8.5. All Smolt Producers

**Footnote**

[190] A. Review the supplier documents provided by the farm to verify compliance of the smolt supplier's policies and procedures with labor requirements.

8.4. All Smolt Producers

**Footnote**


8.3. All Smolt Producers

**Footnote**

[192] A. Obtain copies of the smolt supplier's policy, treatment and resolution of complaints by community stakeholders and organizations.

[193] A. Obtain a copy of the smolt supplier's policy for presentation, treatment and resolution of complaints by community stakeholders and organizations.

8.2. All Smolt Producers

**Footnote**

[194] A. Review documentation from B.3.a to verify that the smolt supplier's consultations and community engagement complied with requirements.

[195] A. Review documentation from B.3.a to verify that the smolt supplier's consultations and community engagement complied with requirements.

8.1. All Smolt Producers

**Footnote**


[197] B. See above.

**Notes:**

- Auditors should not rely on information from a supplier's complaints systems.

- Auditors should also verify that all smolt suppliers' consultation systems are in place.

8.20. Compliance is defined as farm practices consistent with the intentions of the Code, to be further outlined in auditing guidance. For purposes of this standard, this includes an aggressive response to detection of an exotic OIE-listed disease on the farm, which includes depopulation of the infected site and implementation of quarantine zones in accordance with guidelines from OIE for the specific pathogens. Exotic Disease Control Plan is available at https://www.aas.org.au/aasҐ2015-2016-Aquaculture-Health-Code-.pdf.

8.20. Compliance (Required Client Actions)

**Footnote**

[198] A. Instruction to clients for Indicator 8.20 – Consultation and Engagement with Community Representatives

Farms must comply with Indicator 7.1.1 which requires that farms engage in regular consultation and engagement with community representatives and organizations. Under Indicator 8.20, farms must show how each of their smolt suppliers complies with an equivalent requirement. Farms are obligated to maintain evidence that is sufficient to show that their suppliers remain in full compliance.

- The supplier's consultations were effective (e.g. using participatory Social Impact Assessment (pSIA) or similar methods); and
- The supplier's consultations included participation by elected representatives from the local community who were able to contribute to the agenda.

- The supplier's consultations were effective (e.g. using participatory Social Impact Assessment (pSIA) or similar methods); and
- The supplier's consultations included participation by elected representatives from the local community who were able to contribute to the agenda.

**Compliance Criteria (Required Client Actions):**

- A. Review evidence for compliance.

- B. See above.

8.20. Compliance (Required Client Actions)

**Footnote**

- A. Review evidence for compliance.

**Notes:**

- As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.

8.20. Compliance (Required Client Actions)

**Footnote**

- A. Review evidence for compliance.

**Notes:**

- As a surveillance audit, the focus of the audit has revolved around open non-conformities, with several other criteria checked at random. This criteria was not evaluated during the 2016 surveillance audit.
In addition to the requirements above, if the smolt is produced in an open system, evidence shall be provided that the following are met:

**ADDITIONAL REQUIREMENTS FOR OPEN (NET-PEN) PRODUCTION OF SMOLT**

### 8.24

**Indicator:** Where relevant, evidence that the farm has undertaken proactive consultation with indigenous communities

**Applicability:** All Smolt Producers

**Requirement:** Yes

- Review documentary evidence to confirm that the smolt supplier has undertaken proactive consultations.

### 8.25

**Indicator:** Evidence that carrying capacity (or acceptable capacity) of the freshwater body has been established by a reliable entity

**Requirement:** Yes

- Obtain documentary evidence showing that the supplier does or does operate in an indigenous body or where the requirements of 8.22 do not apply.

### 8.26

**Indicator:** Where relevant, evidence that the supplier obtained an assessment of nutrient loading

**Applicability:** All Smolt Producers

**Requirement:** Yes

- Review evidence to determine whether the indicator 8.25 is applicable to the farm’s smolt supplier(s).

### 8.27

**Indicator:** Maximum baseline total phosphorus concentration of the freshwater body

**Applicability:** All Smolt Producers

**Requirement:** Yes

- Obtain documentary evidence showing that the supplier does or does not operate in a freshwater body with native salmonids.

### 8.28

**Indicator:** Where relevant, evidence that the supplier has undertaken professional consultation with indigenous communities

**Applicability:** All Smolt Producers

**Requirement:** Yes

- Review documentary evidence showing that the supplier did or did not operate in a freshwater body with native salmonids.

### 8.29

**Indicator:** Evidence that smolt supplier(s) operate in water bodies with native salmonids

**Requirement:** Yes

- Obtain documentary evidence showing that smolt suppliers operate in water bodies with native salmonids.
If smolt used by the farm are not produced, for part or all of the growth phase from alevin to smolt, in open (net-pen) systems, indicators 8.32 - 8.35 are applicable.

Client shall provide documentary evidence to the CAB about the production system(s) from which they source smolt. Additionally, if the smolt is produced in a closed or semi-closed system (flow through or recirculation) that discharges into freshwater, evidence shall be provided that the following are met:  

ADDITIONAL REQUIREMENTS FOR SEMI-CLOSED AND CLOSED PRODUCTION OF SMOLTS

See Appendix VI for transparency requirements for 8.32.
8.35 All Smolt Producers

Requirement:

Yes

Practices (BMPs) (Appendix VIII-4)

Best Management implementation of biosolids

Indicator

8.34 All Smolt Producers

Requirement:

Yes

Production Systems

Using Semi-Closed or Closed

(methodology in Appendix VIII-2)

Saturation in the outflow

Indicator

Macro-invertebrate

Minimum oxygen saturation in the outflow

A. Verify that the farm has documentation of macro-invertebrate

benthic surveys from one smolt supplier.

B. Review the supplier’s macro-invertebrate survey

C. Review the survey results from one smolt supplier.

D. Obtain documentation from the smolt supplier(s) demonstrating there are comparable results to those observed at Russell Falls hatchery.

E. Review supplier documents to confirm the results follow the prescribed methodology (Appendix VIII-2).

F. Review supplier documents to confirm the survey results show that benthic health is similar to or better than upstream discharge.

G. Review supplier documents to verify that survey results demonstrate compliance with requirements.

This is not relevant for the Rockwood Hatchery as it is a full recirculation system with no discharge. However, it is relevant to the mostly flow through systems at the two Salta hatcheries (Wayatinah River & Florentine Rivers) and Russell Falls (semi-closed system) and this will determine if different technology can be used in the two Salta hatcheries.

Corrective Actions:

Tassal will conduct all Salta water quality sampling including the benthic sampling, and have scheduled them in line with the Russell Falls 6-monthly benthic sampling schedule.

Tassal has gained permission from Salta to have access to lab results from service providers removing sludge at their sites.

Tassal has funded a context report by the consultants Freshwater Systems to compare the current sampling regime with the ASC requirements and provide options for achieving ASC compliance.

The sediment ponds have been emptied of sludge over the past five years (refer Clause 8-A). This is continuing.

Preventive Actions:

Tassal will work with Salta and consultants to determine the scale of works required to improve the abundance aspect of macroinvertebrate conditions downstream of both the Salta Florentine hatchery and the Wayatinah Farm (see Tassal's council approval to install a drum screen on the effluent at Russell Falls). The results of this will determine if different technology can be used at the two Salta hatcheries.

8.33 All Smolt Producers

Requirement:

No

Production Systems

Applicability:

All Smolt Producers

Using Semi-Closed or Closed Production Systems

Indicator: Macro-invertebrate surveys downstream from the farm's effluent discharges demonstrate benthic health that is similar to or better than upstream from the discharge (methodology in Appendix VIII-2)

8.34 All Smolt Producers

Requirement:

Yes

Production Systems

Applicability:

All Smolt Producers

Using Semi-Closed or Closed Production Systems

Indicator: Evidence of implementation of biosolids management (Appendix VIII-4) (methodology in Appendix VIII-4) (Requirement: Yes)

8.35 All Smolt Producers

Requirement:

Yes

Production Systems

Applicability:

All Smolt Producers

Using Semi-Closed or Closed Production Systems

Indicator: Evidence of implementation of biosolids management (Appendix VIII-4) (Requirement: Yes)

8.34 All Smolt Producers

Requirement:

Yes

Production Systems

Applicability:

All Smolt Producers

Using Semi-Closed or Closed Production Systems

Indicator: Summary: As significant progress has been made and there are limitations for implementing these corrective actions which will close the NC out entirely, this minor non-conformity has been extended for 12 months per ASC CA

Minor Non-Conformance was raised in 2015 against 8.34c: Two consecutive Biomonitoring reports for 2014 (initial and follow-up monitoring) at the SaltaHatchery Florentine River showed lack of invertebrate and bioassay results that were not consistent with the ASC requirements.

A Minor Non-Conformance was raised in 2015 against 8.34c: Two consecutive Biomonitoring reports for 2014 (initial and follow-up monitoring) at the SaltaHatchery Florentine River showed lack of invertebrate and bioassay results that were not consistent with the ASC requirements.

Data on DO was submitted to ASC.

8.34 All Smolt Producers

Requirement:

Yes

Production Systems

Applicability:

All Smolt Producers

Using Semi-Closed or Closed Production Systems

Indicator: Maintenance of a copy of all smolt suppliers’ biosolids disposal management plan and confirm that the plan addresses all requirements in Appendix VIII-2.

B. Obtain from the smolt suppliers a process flow diagram showing how the farm is dealing with biosolids.

C. Confirm that form contains declaration from smolt suppliers.

D. Review the supplier’s biosolids management plan for completeness with Appendix VIII-2.

E. Review the supplier’s biosolids process flow diagram for completeness with Appendix VIII-2.

F. Obtain from the smolt suppliers a process flow diagram showing how the farm is dealing with biosolids.

G. Confirm that form contains declaration from smolt suppliers.

H. Review the farm’s records from smolt suppliers to verify there is evidence of implementation of biosolids management as required in Appendix VIII-2.

Records reviewed for all three flow through hatcheries during the 2015 audits:

a. 2/10/14 to 07/25 for RS/RS (BD/FSO), lowest 86%, highest 113%

b. 30/6/14 to 4/07/15 for RS/RS (BD/FSO), lowest 85%, highest 110%

c. 2/10/14 to 04/07/15, lowest 71%, highest 111%

8.35 All Smolt Producers

Requirement:

Yes

Production Systems

Applicability:

All Smolt Producers

Using Semi-Closed or Closed Production Systems

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Russell Falls is a semi-closed system with a proportion of the water recirculated, none of 15YC at MH from this hatchery.

Salta hatchery has outflows into Florentine & Wayatinah Rivers; approx. 20% 15YC smolt were derived from this hatchery.

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a. 2/10/14 to 07/25 for RS/RS (BD/FSO), lowest 86%, highest 113%

b. 30/6/14 to 4/07/15 for RS/RS (BD/FSO), lowest 85%, highest 110%

c. 2/10/14 to 04/07/15, lowest 71%, highest 111%

8.35 All Smolt Producers

Requirement:

Yes

Production Systems

Applicability:

All Smolt Producers

Using Semi-Closed or Closed Production Systems

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Russell Falls has a semi-closed system with a proportion of the water recirculated, none of 15YC at MH from this hatchery.

Salta has 3 effluent tanks – 2 x hatchery and 1 x broodstock. Approx. 10,000L of sludge is removed fortnightly. Also for Salta hatchery reviewed Salta Biosolids removal document, Salta Sludge removal correspondence, Salta data. Analytical Service Tas lab report (11/12/14 & 9/9) for Spectrum for Saltsa sediment pond sludge disposal 5/12/14 and 11/11/15 with inorganic, organic & nutrient tests.
### ASC Audit Report Summary

#### 11 Findings

11.1 A summary table that lists all non-conformities and observations

<table>
<thead>
<tr>
<th>NC reference</th>
<th>NC Status</th>
<th>Clause Reference</th>
<th>Description of NC</th>
<th>Descriptions of actions pending</th>
</tr>
</thead>
<tbody>
<tr>
<td>NC 2015 - 5</td>
<td>Open (extended)</td>
<td>8.4 g</td>
<td>Calculations of total phosphorus released per ton of smolt produced show that for 1/1/14 to 31/12/14 for Russell Falls it was greater than the ASC Requirement 5kg/mt (until 2015) and 4kg/mt thereafter. No calculations have been provided for Saltas.</td>
<td>Tassal are still proposing to install a drum screen within the RAS and an effluent drum screen on the outfall from the settlement pond. Approx. timeframe is 12 months. Recirculation tank has been emptied (March 2016) and Russell Falls is now in compliance. Calculation provided for Saltas</td>
</tr>
</tbody>
</table>
Two consecutive biomonitoring reports in 2014 for the industry owned Saltas Florentine hatchery showed lack of equivalence in TRCI Aquatic life macroinvertebrate condition status ratings between the upstream and downstream sites. While a high score was observed for two aspects at the downstream site, the abundance metric was classified as low, although the report concluded that there was an improved condition rating observed since the initial survey.

Tassal will continue to work with Saltas and consultants to determine the scale of works required to improve the abundance aspect of macroinvertebrate conditions downstream of both the Saltas Florentine hatchery and the Wayatinah hatchery. Tassal has completed a context report by the consultants Freshwater Systems to compare the current sampling regime with the ASC requirements and provide options for achieving ASC compliance.

The company has a robust screening process to ensure that companies contracted to provide supplies and/or services are socially responsible. This includes, for example, a supplier evaluation form to confirm socially responsible practices and policies. However, the supplier screening procedures are not being applied to all suppliers.

A review of the outstanding supplier evaluations for Western Zone to occur and completion to be scheduled.
Currently, the company does not maintain clear records of all grievances, complaints, and labor conflicts that may arise, nor are there records to confirm resolution within 90 days. Despite the lack of formal records in this area, additional evidence was collected via worker and managerial interviews, which confirmed that all complaints were responded to promptly, thus meeting the 90 day ASC requirement. As a result of the indicator being met, this has been designated as an observation.

12.1 A report of the results of the audit of the operation against the specific elements in the standard and guidance documents.

As a surveillance audit, the audit team focused primarily on the non-conformities from the 2015 surveillance audit, as well as spot-checking other indicators at random. Through this exercise, the team found the company to be in compliance nearly all social and environmental indicators reviewed.

12.2 A clear statement on whether or not the audited operation has the capability to consistently meet the objectives of the relevant standard(s).

The audit team found Tassal Pty Ltd to largely in compliance with the requirements of the ASC Salmon Standard v1.0. Per the results of this surveillance audit, Tassal has demonstrated its ability to consistently meet the objectives of this standard.
12.3 In cases where Biodiversity Environmental Impact Assessment (BEIA) or Participatory Social Impact Assessment (PSIA) it shall be added in full to the audit report. If these documents are not in English, then a synopsis in English shall be added to the report as well.

13 Decision

13.1 Has a certificate been issued? (yes/no)
Yes

13.2 The Eligibility Date (if applicable)
4/14/2014

13.3 Is a separate CoC certificate required for the producer? (yes/no)
Yes

13.4 If a certificate has been issued this section shall include:

13.4.1 The date of issue and date of expiry of the certificate.
Certificate issuance date: April 4, 2014
Certified expiry date: April 3, 2017

13.4.2 The scope of the certificate
Aquaculture production of Atlantic salmon (Salmo salar) from Macquarie Harbour MF 214, MF 219 and MF 266.

14 Surveillance

14.1 Next planned Surveillance

14.1.1 Planned date
Jan-17

14.1.2 Planned site
Western Zone Cluster

14.2 Next audit type

14.2.1 Surveillance 1

14.2.2 Surveillance 2

14.2.3 Re-certification

14.2.4 Other (specify type)
x

N/A - surveillance audit.