

ASC New Farm Standards

Summary of Public Comments Received During the Second Public Consultation Period ASC Sea Bass, Sea Bream, and Meagre Standard – ASC Tropical Marine Finfish Standard – ASC Flatfish Standard

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Introduction

This document contains the comments received and the corresponding ASC responses for the second consultation period for the draft ASC Sea Bass, Sea Bream, and Meagre, ASC Tropical Marine Finfish, and ASC Flatfish standards. The second public consultation period was held from August 22, 2017 until September 21, 2017. Comments were submitted by NGOs, industry representatives, and independent researchers and technicians. The comments focused on the whole suite of indicators found within the new standards; mainly requesting additional rationale or specific clarifications and changes within the standards documents. This is the last and final comment period for the new ASC farm standards. After reviewing the comments and making the appropriate changes to the standards documents, the standards will be finalized and published on the ASC website following approval from the ASC Supervisory Board.

The document is organized according to the three new draft standards and is broken down according to the indicator or criteria which is being commented on. There is also an additional section for general comments.

Sea Bass, Sea Bream, Meagre

2.2.2 Weekly average percent saturation of dissolved oxygen (DO) on farm

Comment: Because % saturation controls for temperature and salinity why is it 50% saturation for weekly average for these species when the bar is at 70% for salmon? Why is this different? (WWF-US)

ASC Response: Sea bass and sea bream farms in the Mediterranean and southern Japan are not operating in areas with pristine conditions. There are increased levels of organic material and nitrogen in the water due to runoff/waste water from large-scale coastal development. This can lead to higher levels of aquatic plants and algae and result in localized oxygen depletion. This is especially the case in the hot summer months during periods of humid, overcast weather when oxygen levels are being rapidly depleted but not replaced through photosynthesis. There are often cases where oxygen levels

fall well below 70% in the summer months irrespective of any activity going on at the farm level. This comment brings up a larger point, however, that it is important to keep in mind the different conditions faced by the various sectors of the aquaculture industry. Different regions and different species are going to present different challenges. The bar that is appropriate for the salmon industry (a sector that has existed for over 30 years) may not be appropriate for all marine finfish in all areas of the globe.

2.2.4 Quarterly monitoring of Total Ammonia Nitrogen, NO₃, and total P levels on the farm and at a reference site

Comment: For quarterly monitoring parameters, it is better to specify what it means by NO₃ (do you mean NO₃-N ?) (Aquaculture Expert, Uwajima)

ASC Response: The standard refers specifically to nitrate, NO₃.

Comment: There is no justification included as to why 4x a year is credible or valuable sampling regime? Where did this sampling protocol come from? Relevant and effective sampling procedures are an important part of the credibility of the standard. (WWF-US)

ASC Response: In reviewing over ten years of industry data from sea bass, sea bream and meagre farms as well as the data that ASC collected for the past five years from ASC certified salmon farming operations, it was found that there is very little variation from the baseline. Ocean chemistry around farm sites remains largely constant and independent of any farming activity. As part of the operational review for the ASC salmon standard the technical committee also recommended quarterly monitoring and it makes sense for the new farm standards to be in alignment for consistency.

2.2.5 Evidence that the type of biocides used in net antifouling are approved according to legislation in the European Union, or the United States, or Australia

Comment: It is not clear about the rationale for referring to legislations in the European Union, United States or Australian for net antifouling biocides. It will be a complicated process for cross-checking the lists for producers outside those three countries. ASC should consider preparing the summary of approved lists of net antifouling biocides and active ingredients. (Aquaculture Expert, Uwajima)

ASC Response: ASC agrees with this comment and will include provisions within the standard for equivalency with Japanese regulations.

3.1 Culture of non-native species

Comment: WWF has strong concerns about this not being consistent with the salmon standard which as of June 2017 requires that certified farms have identified or are establishing credible studies that look at the risks of establishment (more than “a proper assessment of the potential risks is desirable”). The intent behind this approach in the salmon standard should also be applied here especially given potential changes in risk of establishment due to changing environmental/climatic conditions. Non-native species which have not been established in the past despite farming activities could suddenly become a much larger risk/ threat calling into question whether ASC certification of such an increased risk (if shown through credible study) is still responsible.

WWF suggests that the bass/ bream/ meagre standard includes a similar approach if these species are

cultivated in locations where they are not native species and have not been widely established already. (WWF-US)

ASC Response: It is unclear what the commenter is referring to. Based on feedback from WWF during the initial comment period the requirement for indicator 3.1.1 (Culture of non-native species) was changed to read "None, unless the farmed species already occurs in the region at the time of the first publication of the ASC Sea Bass, Sea Bream, and Meagre Standard". Since the species in question are actually native to the regions they are currently being farmed in, this requirement basically prohibits the introduction of any non-native species. Any study to determine whether they would become established is irrelevant since they are in fact native species that already exist in the wild.

3.3.3 Allowance for more than two (2) escape events of 30% or more (cumulative total fish not recovered at the farm level) within 2 years

Comment: More than one such event within 2 years should not be allowed. 2 times > 30 % within 2 years sounds very much. There are several 10,000s in one cage ? If this happens one time the owner should learn to prevent it. Salmon standard dictates 300 as maximum number of escapees per cycle.

This indicator is not strong enough. WWF suggests revisiting the approach in the salmon standard where there is both a trickle and a mass escape event standard as both are of concern to WWF. Escapes can compete with wild species of the same and different species, alter local food webs and create genetic pollution if selectively bred farmed stock bred with wild individuals of the same species. The current approach includes fish counting, so the standard should also include maximum unexplained trickle loss amount that is based on fish stocked in each pen. This number can be revised based on fish counting records. In salmon it is set at 300.

Additionally, in the salmon standard, the allowance for a mass escape event is a rare exception allowed once every 10 years if shown to be outside of a farm's control. 30% escape of a farm could represent several entire cages of a production site. WWF does not feel this standard will be credible with regard to escapes if certified farms are allowed to have such a high number of escape incidents. WWF advocates for approach and levels similar to the salmon standard where mass escape events at certified farms are only permitted once every few production cycles. (WWF-US)

ASC Response: As explained in the TOR for new ASC farm standards (<https://www.asc-aqua.org/wp-content/uploads/2017/07/TOR-New-ASC-Farm-Standards.pdf>) and at the beginning of the Sea Bass, Sea Bream, and Meagre Standard, the new farm standards were based on content from existing ASC content after site visits and pilot audits throughout the Mediterranean and in Japan. The Sea Bass, Sea Bream, and Meagre standard was based to a large degree on the ASC salmon standard, but also took content from the WWF coordinated ASC Seriola and Cobia Dialogue Standard. In the case of escapes, since sea bass, bream, and meagre are non-anadromous and are native to the regions they are being farmed in, it was appropriate to use the content from the Seriola and Cobia Standard as opposed to the more specific content of the salmon standard that seeks to protect native spawning populations and the riverine ecologies that depend on them. The point regarding mass escapes is well taken though and the standard will be amended to only allow for one escape event of over 30% from the previous two years.

3.3.4 Number of known escapes is documented and made publically available upon request

Comment: "upon request" should be deleted. If there is a mass breaching they must be transparent about it and they should openly and timely announce that. This would also help to attract people to go

fishing for them. (WWF-US)

ASC Response: Not all farms have access to or use web based communication formats or operate in areas where regulatory agencies address this issue. The standard requires farmers to record and document all escape events. If they operate in areas where regulatory agencies monitor this and have the resources to follow up than they are most likely already reporting their escapes (or they would be in violation of Principle 1). Otherwise the standard requires farmers to have this information on hand and available to whomever seeks it.

3.4.1 Evidence that purchased or collected wild fingerlings are harvested from a source fishery with a public fishery assessment, for example FishSource (score of at least 6), or is in a credible fishery improvement process (FIP) moving towards an ISEAL compliant fisheries sustainability certification scheme

Comment: WWF suggests the removal of this indicator and replacement with an indicator only allowing hatchery reared fingerlings for ASC certified bass, bream and meagre. (WWF-US)

ASC Response: Due to the pressure on already depleted wild fish stocks for the species in question this comment will be incorporated into the final draft of the ASC Sea Bass, Sea Bream, and Meagre Standard.

Criterion 4.3 Responsible Sourcing of Marine Raw Materials

Comment: As a stakeholder in this process it would have been beneficial to see the final feed standard when evaluating the overall standard for Sea Bass, bream and Meagre... not to mention all of 4.3 is irrelevant based on the variance granted by the interim solution. (WWF-US)

ASC Response: Comment is well received. The Feed Standard has been delayed, but is expected to be completed during the first part of 2018

Criterion 4.2 Efficient and optimized diets

Comment: What is a high-quality product?

One way to describe nutritional quality is quantity and composition of PUFA-s. For example, we can compare two groups of fish which are fed with feed which provide FFDR fm 1,8 and FFDR fo 3 to feed which provide FFDR 1,9 and FFDR fo 6 . The first group (FFDR 1,8 and FFDR fo 3) produced fish with omega 3/6 ratio 0,4-0,5 % and the second group produced fish with omega 3/6 ratio > 1%.

This information can be used for marketing purposes, where the fish certified by ASC standard is in a worse position, which can be a problem for fish producers. I strongly believe that we, as fish producers have to produce a high –quality product in correlation with sustainable development. (Cromaris)

ASC Response: ASC appreciates the concern of industry to produce a high-quality product, but as an organization whose mission is to reduce the impacts of aquaculture, the ASC is responsible for promoting the reduction and responsible use of wild fish in feed. The standards for FFDRm and FFDRo have been set at a level which represents best practice in terms of feeding efficiency. While we understand the importance of quality the main driver behind the standards is to promote greater sustainability.

Comment: FFDRm for Red Sea Bream is proposed to be below 4.5 for the first 3 years. However this is only achievable for fish harvested at around 1 kg. In Japan, Red Sea Bream are marketed at wide range of sizes from 0.8kg to 2.5kg, with average of 1.5-2kg. Those fish cultured to large size, go through a maturation and have significantly reduced FCR. Therefore, it is better to set the FFDRm according to the harvest size. Based on the Ehime prefecture's data, where more than half of the national Sea Bream are produced; 1.0-1.5kg fish had average of 5.2 FFDRm (N=13, 4.3-6.5) and 1.5-2.0kg fish had average of 6.2 FFDRm (N=8, 5.9-7.1). Therefore, we suggest 4.5 FFDRm for fish less than 1.5 kg and FFDRm 5.5 for fish more than 1.5 kg. (Aquaculture Expert, Uwajima)

ASC Response: Since the standard strives to promote greater sustainability in aquaculture, there are some trade-offs that need to be considered if a farm wishes to pursue certification. The feed efficiency requirements have been set at levels that represent best practice; as your data shows. For farms interested in certification some adjustments may have to be made in order to reach these performance levels. This may mean adjusting the ingredients of feed or as you mention harvesting smaller sized fish. In the end, the bar still has to be set at a level that will drive improvements and innovation.

Comment: It is difficult to evaluate these numbers when no (summary) data is provided contextualizing them and overall performance within the industry, the justification that "ASC has set them at the right level to encourage improvement" does not suffice. The data from producers and feed companies that is referred to in the rationale should be summarized in a transparent way showing the industry ranges, averages, etc in different locations for the different species. The performance bar should be set at a level that represents current good practice but can be achieved through improvements and innovation. This type of transparency and data is a critical part of multi-stakeholder buy in and standards formation process. This is another example where if there was a clear process for setting these numbers within the ASC core standards process, it would be easy to understand what is needed and then generally where the bar should be set. These proposed numbers are not credible without the summary data. (WWF-US)

ASC Response: Like the original WWF Aquaculture Dialogues the new ASC farm standards have set the bar for efficient and optimized diets at a level that represents current good practice. The rationale has been amended to include industry ranges for the species and regions in which they are farmed so that readers of the standard can evaluate the levels in context with the industry as a whole. Since feeding efficiency will be variable across the different species and regions this is an issue area that would need to be addressed outside of the core standards process anyways.

4.3.2 Prior to achieving 4.3.1 the fishmeal or fish oil used in feed must have a FishSource score of 6.0 or higher, and an 8 in the biomass category or show evidence of being engaged in a credible and time bound fisheries improvement project (FIP)

Comment: The fishmeal fisheries are spread around the world but there is limited number of fish species that have FishSource score, and gaps where those species are located. Alternatives should be allowed if a national authority or research institute conducts robust fisheries assessment, and be able to explain sustainability of the fisheries as much as the FishSource score. In Addition, since the coverage of FishSource score is limited, ASC should propose a way to improve this situation as well as proposing alternatives. Currently those fishmeals that have FishSource score are transported across the world and this is not consistent with energy consumption and greenhouse gas emission point of view defined in 4.6. (Aquaculture Expert, Uwajima)

ASC Response: This comment is well taken. ASC hopes that the ASC feed standard which is scheduled to be completed in early 2018 will address many of these concerns.

4.4.2 Documentation of the use of transgenic plant raw materials, or raw materials derived from genetically modified plants, in the feed

Comment: Should be same text as in the salmon standard: Evidence of disclosure to the buyer of the salmon of inclusion of transgenic plant raw material, or raw materials derived from transgenic plants, in the feed. (WWF-US)

ASC Response: This requirement came out of harmonization with the other existing ASC farm standards (Seriola/Cobia, Trout and others) and only serves as a placeholder that will be superseded by the ASC feed standard when it is completed at the beginning of 2018.

5.2.4 Number of anti-parasiticide treatments not including freshwater, formaldehyde or hydrogen peroxide allowed per life-cycle

Comment: WWF does not advocate for untreated fish to die. Rather, as this is a responsible aquaculture standard, what does responsible use look like? Is once per life cycle the correct allowance/ performance bar for ASC? Are all the parasiticides the same in toxicity? Why are formaldehyde, H₂O₂ excluded? This is another lost opportunity with the harmonized core approach—if there was a rationale for the aims, the data needed and the ideal bar— both the parasiticide and antibiotic approaches would be easier to understand and for various stakeholders to accept. It is a very unclear area scientifically but this approach is very different from the approach in the evolving salmon standard on parasiticide use. Clarifications that are discussed in detail in salmon such as partial treatment seem to be missing here. WWF cannot accept or evaluate these two numbers without seeing the data and then understanding how these bars are set. (WWF-US)

ASC Response: The situation with sea bass and sea bream with respect to parasites is very different from salmon. The reason why one anti-parasiticide treatment is allowed is due to the fact that in some areas of the Mediterranean (Greece/Turkey) fish will occasionally become infected with gill parasites and die if they are not treated. This is a very infrequent occurrence but still must be considered. Farmers only use SLICE to treat for these outbreaks. Formalin and H₂O₂ are allowed because they are generally used sparingly in order to protect the fish being treated and they break down quickly and do not remain as persistent toxins in the marine environment.

Criterion 5.2 Chemicals and treatments

Comment: Salmon standard: 5.2.3 All medication events that are prescribed by a veterinarian

REPEATED COMMENT: This is one of the core requirements of all ASC standards. Antibiotics have to be prescribed by a veterinarian. Should be included also in this standard. Salmon diseases are also well known.

Salmon standard 5.2.10 If more than one antibiotic treatment is used in the most recent production cycle, demonstration that the antibiotic load is at least 15% less than that of the average of the two previous production cycles

REPEATED COMMENT: Should be included in the Seabass standard to encourage minimization of antibiotic usage

Salmon standard 5.2.11 Presence of documents demonstrating that the farm has provided buyers of its salmon a list of all therapeutants used in production

Should be added. (WWF-US)

ASC Response: The Sea Bass, Sea Bream, and Meagre Standard requires farms to have a veterinary approved fish health management plan for the identification, monitoring and control of diseases and parasites. Any medication used on a farm would have to be approved by a veterinarian. Common diseases on bass and bream farms are well known and site managers have the ability to treat these diseases on site based on veterinary approved protocols. The number of antibiotic treatments allowed in the standard is in line with best industry practice and unlike the salmon standard includes the use of antibiotics in hatcheries, so is actually a higher bar. While it is included in the salmon standard, what a farm discloses to its buyers should really be left up to any contractual agreements that are in place between these two parties and not something that can be policed by voluntary ASC audits.

Tropical Marine Finfish

2.2.2 Weekly average percent saturation of dissolved oxygen (DO) on farm

Comment: Because % saturation controls for temperature and salinity why is it 50% saturation for weekly average for these species when the bar is at 70% for salmon? Why is this different? (WWF-US)

ASC Response: As with sea bass and sea bream, most tropical marine finfish farms are not operating in areas with pristine conditions. Increased levels of organic material and higher levels of aquatic plants and algae in the water can result in localized oxygen depletion. This is especially the case in the tropics during periods of humid, overcast weather when oxygen levels are being rapidly depleted but not replaced through photosynthesis. There are often cases where oxygen levels fall well below 70% irrespective of any activity going on at the farm level. Again, different regions and different species are going to present different challenges. The bar that is appropriate for the salmon industry (a sector that has existed for over 30 years) may not be appropriate for all marine finfish in all areas of the globe.

3.1.1 Culture of non-native species

Comment: same comment as above to consider the same approach as salmon as of June 2017 on native species cultivation and evaluation of risk of establishment/ monitoring when non-natives are (WWF-US)

ASC Response: As explained earlier, the new farm standards were based on the most appropriate content from the existing ASC standards. In some cases this meant that ASC salmon content was used. The ASC Tropical Marine Finfish standard is the result of a process coordinated by WWF Coral Triangle. For this indicator, stakeholders participating in this process (formerly the WWF Grouper, Snapper, Barramundi Dialogue) felt that the WWF Seriola/Cobia Dialogue content was more appropriate.

3.3.3 Allowance for more than three (3) escape events of 30% or more (cumulative total fish not recovered at the farm level) within 10 years

Comment: same comment as above. 3 escape events of over 30% over 10 years is better than what is in

the seabass/ bream/ meagre standard (2 in 2 years) but WWF would prefer to see this be closer to the Salmon standard which allows one such even every 10 years given it can be documented outside of a farm's control. There also should be an indicator (number of fish) related to the counting/ trickle escape issue. The way this is written you could have 29% of a farm (which could be multiple cages in their entirety) lose their fish and the farm could still be certified as a top environmental performer? This will be a credibility issue in the environmental community. (WWF-US)

ASC Response: Again this is based on the WWF Seriola and Cobia Dialogue Standard, but is actually more rigorous. The content was agreed to by the stakeholders involved in the WWF Grouper, Snapper, Barramundi Dialogue (participants can be found at the end of the standard document). Environmental NGOs (including WWF Coral Triangle, WWF Malaysia, and WWF Indonesia) as well as conservation minded academics participated, so it is a little confusing as to why the commenter claims that this will not be credible within the environmental community.

3.4.1 Evidence that purchased or collected wild fingerlings are harvested from a source fishery with a public fishery assessment, for example FishSource (score of at least 6), or is in a credible fishery improvement process (FIP) moving towards an ISEAL compliant fisheries sustainability certification scheme

Comment: WWF recommends deleting this entire indicator and replacing it with requirement that all fingerlings come from a hatchery source for ASC certified TMFF. (WWF-US)

ASC Response: Based on the stock status and management of the species in question ASC agrees with this comment and will amend the standard accordingly. This will make the sourcing of fingerlings more straight forward for producers and auditors and avoid controversy surrounding the use of depleted stocks for sourcing.

Principle 4

Comment: same comments as above on feed section, including for the FFDR for the different species and timelines for them. Need transparent data, goals and rationale... (WWF-US)

ASC Response: The participants of the WWF Grouper, Snapper, and Barramundi Dialogue carefully reviewed FFDR data from producers and feed companies. Through transparent discussions during the Dialogue thresholds were set at levels to incentivize producers to make meaningful improvements in efficiency and to optimize the use of marine ingredients in feed. These levels will decrease in three year increments in order to continue to drive improvement and innovation.

5.2.5 Number of treatments of antibiotics over the most recent production cycle

Comment: same comments as above. This is critical as these numbers are currently set the same without a sense of what current use is, best practice and how those tie to these numbers. This is a huge, credibility risk for ASC. If 3 uses is not best practice, the entire standard looks very weak. This is also a very visible issue that many will look at AND benchmark against so it needs to be very clear why level is set at 3 for all the 3 species in this standard.

ASC Response: The allowance for 3 antibiotic treatments (including the hatchery) is actually a higher bar than that set for ASC salmon even though tropical marine finfish species have a similar growout period. Generally speaking tropical marine finfish aquaculture is a much less developed industry than salmon

aquaculture; without the advantage of years of research into vaccine production and common disease treatments. The participants in the WWF Grouper, Snapper, and Barramundi Dialogue thought that by the setting the bar equivalent or higher to that of salmon, they were actually establishing quite a high threshold with respect to anti-biotic use.

Flatfish

3.1.1 Culture of a non-native species

Comment: Same as above (WWF-US)

ASC Response: Many flatfish species that are farmed throughout the world are non-native to the region that they are being farmed in. However, the standard stipulates that they must be farmed in aquaculture systems that ensure farmed animals cannot escape and become established in the wild.

3.3.3 Number of known escapes is documented and made publically available upon request

Comment: Same as above (WWF-US)

ASC Response: Again, not all farms have access to or use web based communication formats or operate in areas where regulatory agencies address this issue. The standard requires farmers to record and document all escape events. If they operate in areas where regulatory agencies monitor this and have the resources to follow up than they are most likely already reporting their escapes (or they would be in violation of Principle 1). Otherwise the standard requires farmers to have this information on hand and available to whomever seeks it.

3.4.1 Evidence that purchased or collected wild fingerlings are harvested from a source fishery with a public fishery assessment, for example FishSource (score of at least 6), or is in a credible fishery improvement process (FIP) moving towards an ISEAL compliant fisheries sustainability certification scheme

Comment: Same as above. (WWF-US)

ASC Response: ASC agrees with this comment and will amend the standard accordingly.

5.2.5 Number of treatments of antibiotics over the most recent production cycle

Comment: again, same comments as above. Zero is clearly top level for parasiticide but why is 3 antibiotic treatments the appropriate level here? Highly visible credibility issue. Will not benchmark/ be perceived well by others in environmental community/ ratings schemes.(WWF-US)

ASC Response: Prophylactic use of antibiotics is actually quite common in flatfish production in Asia. The standard, which specifies that only 3 treatments are allowed per life cycle including fingerling production in hatcheries is actually a higher bar than is set for ASC salmon which has similar grow out periods. As with tropical marine finfish, flatfish aquaculture is a much less developed industry than salmon without the advantage of years of research into vaccine production and common disease treatments. Clearly the standard is quite ambitious and definitely represents best practice within the sector.

General Comments

WWF congratulates ASC on the new species standards. Very exciting to see more opportunities to drive responsible aquaculture in new geographies and with new species.

A few general comments, as we have mentioned before, WWF feels there are lost opportunities that the ASC core standard and approach wasn't developed before new species standards were developed. For instance, a bigger comprehensive multi-stakeholder look/ discussion at EIA approach and approach to AZE and its methods could be streamlined and updated. The ASC has been operational for 5+ years and these approaches should be assessed and improved for effectiveness and efficiency as they form a key part of many of the species-specific standards.

WWF also suggests that ASC standards could benefit from a clear process on how to set the species specific metrics for new species/ updating old species values to help ensure consistency and transparency in new values. This would be relevant to metrics like FFDRm and FFDRo, antibiotic and parasiticide use, etc. This process should include transparent data representing entire range of values for production in all relevant geographies, the stated performance bar/ goal for each particular metric standard and any other relevant information that can help stakeholders reliably assess proposed values and what they will mean. Without this, it is nearly impossible for stakeholders to assess and accept the credibility of these levels. Lastly, a completed feed standard would help evaluate the overall package of each individual standard. (WWF-US)

ASC Response: The ASC core standard development is still ongoing but has been given a new focus and is now referred to as an ASC aligned standard. Over the next year or so, ASC will definitely be taking a closer look at aligning the different issue areas which have been mentioned (e.g. EIAs, benthic monitoring etc.) and will seek to form Technical Working Groups comprised of independent stakeholders and experts for those areas where greater technical capacity is needed. These improved approaches will certainly be incorporated into the individual species/systems components of the ASC aligned farm standard. For the new farm standards, the rationales for feeding efficiency have been updated to include ranges of performance within the various sectors in order to help stakeholders assess the thresholds within the context of average industry performance.