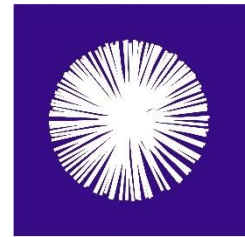


The use of biomass or feed to regulate the organic output from marine pen fish farming to the environment

January 17th 2020



Scottish
Environment

LINK

Introduction to Scottish Environment LINK

Scottish Environment LINK is the forum for Scotland's voluntary environment community, with over 35 member bodies representing a broad spectrum of environmental interests with the common goal of contributing to a more environmentally sustainable society.

Its member bodies represent a wide community of environmental interest, sharing the common goal of contributing to a more sustainable society. LINK provides a forum for these organizations, enabling informed debate, assisting co-operation within the voluntary sector, and acting as a strong voice for the environment. Acting at local, national and international levels, LINK aims to ensure that the environmental community participates in the development of policy and legislation affecting Scotland.

LINK works mainly through groups of members working together on topics of mutual interest, exploring the issues and developing advocacy to promote sustainable development, respecting environmental limits. This consultation response was written by LINK's Aquaculture Subgroup.

LINK members welcome the opportunity to comment on this consultation and consider tighter regulation on waste management as essential for reducing the impact salmon farming has on the marine environment.

The two parliamentary inquiries in 2018 both highlighted concerns over the environmental impact of salmon farming in Scotland, with the Rural Economy and Connectivity Committee recommending that "...if the industry is to grow, the "status quo" in terms of regulation and enforcement is not acceptable" (Recommendation 2). It is clear that regulatory reform of the industry is required and this consultation provides an opportunity to reassess the licensing process and contribute towards ensuring salmon farming activity does not breach the environmental limits of the surrounding waters.

The REC Committee also considered it essential that SEPA "introduces a significantly enhanced regulatory and monitoring regime under which it will robustly and effectively enforce compliance with environmental standards" (Recommendation 62). SEPA's most recent seabed survey found 19% of farms were non-compliant (as presented in the Aquaculture Sector Plan), suggesting the need for urgent improvements to how the waste emanating from salmon farms is controlled.

The Aquaculture Sector Plan highlights the need for continued investment and development of environmental monitoring techniques. While this is welcome and will provide a more accurate assessment of the seafloor impact of salmon farming, it does little to control the amount of waste leaving a farm. Key to controlling salmon farm waste is controlling the amount of food (and medicines) put into a farm (a preventative approach). Therefore, this consultation on whether

LINK Consultation Response January 2020

biomass or feed limit should be the controlling factor in determining the appropriate size of a salmon farm is very much welcome and pertinent to the ongoing process of mitigating the environmental impact of salmon farming.

Q. Do you consider that we should use biomass or feed as a proxy for the pollutant load from a fish farm?

LINK members are concerned over the impact waste material leaving fish farms is having on the seafloor and benthic marine life in the surrounding area. We consider it essential that these impacts are minimised and that, where they occur, we have a complete understanding of how marine life is affected and at what scale. LINK members will support changes to regulation and farm operations that will improve our ability to measure, monitor, control and minimise (if not eliminate) the environmental impact of salmon farming in Scotland.

LINK members consider that, from an environmental and regulatory perspective, it appears logical to use feed as a proxy for pollutant load from a fish farm instead of fish biomass. With respect to the impact on the benthic environment below a fish farm, it is LINK's view that the amount of fish biomass held within a farm is irrelevant and that it is the amount of food (and medicines) entering a farm, and the subsequent waste leaving a farm, that needs to be monitored and controlled.

LINK members consider the benefits of using feed over biomass as a proxy for pollutant load are:

- There is a direct link between feed input and waste output from a farm and, therefore, the level of environmental impact can be more accurately determined. Using only biomass as a limiting factor would not control the amount of food entering the farm and, therefore, the waste output would be unknown;
- The amount of feed used at a farm can be more easily and accurately measured and monitored. Additionally, feed used is easier to audit than biomass and, therefore, limits can be more easily enforced and infringements penalised;
- The total feed input and, therefore, waste output (including any uneaten food) can be measured and controlled. The use of biomass as a proxy would not incorporate any uneaten food and, therefore, may underestimate the level of impact on the seafloor.
- The feed limit permitted for a proposed farm would have to comply with the environmental limitations of the surrounding area. Therefore, public confidence that the fish farm is operating within environmental limits would increase.
- The accuracy of data available on feed use would increase transparency in farm operations and their impact on the seafloor.

Q. Do you have any other responses to make to this consultation?

LINK members consider that the use of feed as a proxy for pollutant load, and using environmental limits to determine the maximum amount of feed that can be used at a farm, will drive innovation in waste capture technology. For example, if a farm operator installs waste capture technology and can demonstrate a reduction in waste entering the marine environment, they could be eligible for an increased feed limit and, therefore, increase the productivity of their farm. The introduction of such technology could, potentially, open up new areas for farm development that were previously unsuitable for open cage farms.

LINK Consultation Response January 2020

LINK members consider it vital to acknowledge that the strong recommendations from the ECCLR and REC Committee inquiries apply to existing as well as future farming activity and that the impact of existing farms must be addressed. Therefore, we would like to see any resulting changes in the licencing system to be retroactively applied to all existing farms, as well as new farms.

This response was compiled on behalf of LINK Marine Group and is supported by: Fidra, Marine Conservation Society, Scottish Wildlife Trust, and Whale and Dolphin Conservation.