Multi-annual National Strategic Plans for the development of sustainable Aquaculture for the period 2021 to 2030

Summary MALTA

"Malta's Multiannual National Plan for the Development of Sustainable Aquaculture 2022-2030"

1. State of the aquaculture sector

The Maltese aquaculture industry is entirely dependent on marine resources and is divided into two distinct sectors: (i) the *Capture-Based Aquaculture (CBA) of Atlantic Bluefin tuna (Thunnus thynnus)*, and (ii) the *Closed-Cycle Species (CCS), mainly Gilthead Sea bream (Sparus aurata) and European Sea bass (Dicentrarchus labrax)*. Commercial production of these CBA and CCS systems is exclusively conducted in floating cage culture systems. Alternative fish species have been cultured by the Aquaculture Directorate, such as the Meagre (*Argyrosomus regius*), Sea Bream (*Diplodus sargus*), Bluefin Tuna (*Thunnus thynnus*) and the Amberjack (*Seriola dumerili*). In addition, pilot culture studies have been carried out for Sea urchins (*Paracentrotus lividus*), Sea cucumbers (*Holothuria poli, Parastichopus regalis*), Cuttlefish (*Sepia officinalis*) and Red scorpionfish (*Scorpaena scrofa*). Currently, the number of aquaculture enterprises is 7. The total output value generated by the Maltese aquaculture industry rose by €2.4 million, i.e. 1.4% over that registered in 2019. In the same year, the volume of production was 19.829 tonnes.

2. Objectives for 2021 to 2027

- Building resilience and competitiveness.
- Participating in the green transition.
- Ensuring social acceptance and consumer information.
- Increasing knowledge and innovation

Growth targets

Maltese aquaculture is a valid economic sector with a positive growth potential and its expected expansion is based on the potential identification of new aquaculture zones to be used for CCS and other novel species and on reaching the CCS production target of 5,000 tonnes, in addition to the tuna farming production, until 2030. It is forecasted that the industry will increase direct and indirect jobs by up to 25% by 2030 with a Gross Value Added of around €70 million to the Maltese economy.

3. Objectives for Measures for 2021 to 2027 responding to the 13 key areas listed in the "*Strategic Guidelines for a more sustainable and competitive EU aquaculture for the period 2021 to 2030*"[1]

1. Access to space and water

To identify other potential land-based, inshore and offshore aquaculture sites for the expansion of existing aquaculture, and the introduction of new aquaculture species and strategies.

2. Regulatory and administrative procedures

- Review relevant legislation and explore ways to simplify and facilitate application procedures, including the revision of the permit application fees.
- Set up an Aquaculture Board that brings together public authorities with responsibilities for aquaculture to facilitate the planning, funding, licensing, and monitoring of aquaculture activities in a timely manner. National legislation shall also be amended to accommodate such a mechanism.
- Enhance the administrative and regulatory capacity of the Aquaculture Directorate in relation to concession fees, control, offences, penalties and enforcement measures, compliance and reporting obligations by making the necessary amendments in the current legislation and transposing the existing SOPs into law.

3. Animal health and public health, animal welfare

- Enter into the discussion with the public entities (VRD) responsible for the regulation and administration of the local animal welfare sector to address lacunas in the legislation to ensure that fish welfare concepts are integrated especially with regard to the facilitation of enforcement in this respect.

[1] COM(2021)236 final

- Prepare contingency mechanisms, together with the VRD, that can be implemented in the case of an outbreak of either an emerging disease problem or a notifiable disease.
- Outline an effective disease-monitoring plan to maintain a high level of disease awareness and preparedness and to ensure environmental protection.
- Support the industry by carrying out analytical testing within the Aquaculture Directorate.

4. Climate change adaptation and mitigation

- Increase investments in R&D and conduct research both on the effect of Climate Change on the local aquaculture industry and on sustainable genetic technologies to create farmed types that are resistant to, can adapt to, or can minimize the impacts of climate change. Research will focus also on alternative production species such as microalgae and macroalgae, to contribute towards increased sustainable production by minimising the carbon footprint of fishmeal-based feeds.
- Integrate climate-proofing, technological and financing innovations that increase adaptation and resilience of the sector, including innovations in institutions, emissions reductions, and renewable energy systems.

5. Producer and market organisations

- Attend/participate in international import expos and fairs which showcase the Maltese aquatic product for potential export.
- Develop and coordinate trade delegations by the Malta Food Agency/Trade Malta/Malta Enterprise to visit Third Countries for potential tapping of export markets and/ or sharing of knowledge and resources.
- Encourage small-scale aquaculture producers to form a cooperative or federation by emphasizing on factors that contribute to the strengthening, empowerment, and sustainability of such aquaculture-related associations for small-scale farmers and operators.
- Support and collaborate with the industry or associations in matters involving the development of the aquaculture sector and encourage operators to collaborate in order to benefit from economies of scale through synergies, access to EU funding programmes, best practices and sharing of ideas and resources.

6. Control

- Reinforce the importance of labelling in relation to the sale of aquaculture products to enhance consumer green choices.
- Strengthen inspection activities at retail outlets selling aquaculture products, by collaborating with other entities like Malta Competition and Consumer Affairs Authority (MCCAA) and VRD, to monitor and enforce labelling information in relationship to aquaculture products and also to possibly identify misleading information of fraud.

7. Diversification and adding value

Invest in research and innovation to:

- Introduce CCS innovative species with potential for aquaculture.
- Explore alternative production systems aimed at reducing the vulnerability risks associated with monoculture practices.

Develop synergies with existing activities (recreational fisheries, tourism, the processing industry) to generate additional income opportunities such as aquatourism, for farmers and improve livelihoods.

8. Environmental performance

- Adopt an Ecosystem-based Approach to ensure that cumulative pressures are compatible with Good Environmental Status (GES) and sustainable use of resources.
- Strengthen the commitment of the sector to the marine environment integrity updating the established Environmental Monitoring Programme (EMP) for the aquaculture activities to conform to the Marine Strategy Framework Directive and kept it up to date in relation to emerging contaminants such as pharmaceuticals.
- Strengthen the current criteria and methodological standards (Environmental Quality Standards) to set quantifiable targets and indicators that are specific to the local context (waste management, pollution response, periodic monitoring of water quality, sediment, and benthic habitat quality).

9. Communicating on EU aquaculture

- Target marketing strategies and education initiatives to aid consumers understand and appreciate the health and environmental benefits of aquaculture products intended for human consumption.

- Embark on a series of campaign projects, through EMFAF, aimed at improving public perception, building trust and addressing issues on food security through education.
- Launch of a promotion campaign, through EMFAF, aimed at primary and secondary school students to raise awareness about aquaculture and its contribution to society.
- Promote sustainable aquaculture and disseminate information on this sector by making the Aquaculture Directorate available for educational visits both for students and for the general public.

10. Data and monitoring

- Facilitate and create a system that integrates all the different features used to manage the Aquaculture Directorate's data recording in a single interface and the obligation to send data will be enforced in the relevant S.L.
- A new web-based facility/portal is being finalized and will provide each operator with access to his/her personalised online portfolio, which will encompass all operational details. It shall also include a payment facility.

11. Knowledge and innovation

- Develop education programmes and sustainable aquaculture training.
- Introduce a scheme for sponsoring Degrees in aquaculture or related fields and subsequently promote employment within the aquaculture Directorate.
- Plan specific training for Officers to improve and acquire new skills related to the sector, for example for disease surveillance and notification. These training activities should be supported by EMFAF funds.
- Encourage, through EMFAF, research on land-based and cage-based Integrated Multi-Trophic Aquaculture (IMTA) and Aquaponics to increase production and environmental sustainability, while contributing to lower vulnerability risks and increased resilience to climate change.
- Encourage R&D and investment to develop the appropriate techniques and technologies from pilot to commercial scale production of alternative species such as:
    - Marine fish species, for example, the common dentex, bogue and mackerels to reduce pressure on the wild populations of small pelagic species used as baitfish, through EMFAF.
    - Lower trophic organisms that include invertebrates (e.g. sea cucumbers and sea urchins) and macroalgae as part of emerging sustainable strategies of production, funded through EMFAF.

- Microalgae and macroalgae to produce algae-based products for cosmetic, nutritional and application purposes, and as a protein source in feed development.

4. Funding

The MNSPA can be financially supported via Maltese National Funds, co-funded by EMFAF or other EU Funds, as well as the local industry. Environmental Promotion and Protection Fund shall also be set up and launched for this purpose, which shall focus on financing environmentally sustainable aquaculture projects.