Recirculation Aquaculture Systems



AquaBioTech Group is an international consulting, engineering and aquatic Contract Research Organisation (CRO) company with over 25 years of experience in aquaculture, fisheries and other aquatic sciences. Located in the centre of the Mediterranean on the island of Malta, although operating globally with clients and projects in over fifty-five countries. The vast majority of the organisation's work is related to the marine or aquatic environment, encompassing aquaculture developments, market research/intelligence through project feasibility assessments, finance acquisition, project management, technology sourcing, technical support and training.

AquaBioTech Group has an established, global reputation in designing, installing and operating Recirculation Aquaculture Systems (RAS) facilities.

AquaBioTech Group

RECIRCULATION AQUACULTURE SYSTEMS (RAS)

Recirculating Aquaculture System (RAS) development has entered into a new chapter and **AquaBioTech Group** has been at the forefront of this technology for many years.

The organisation has developed a number of highly efficient and cost-effective RAS for hatchery, broodstock, aquatic research and on-growing operations. Each system is customised using proven technology according to the species and production level.

The company developed its own proprietory RAS designs for a variety of species of major commercial importance. We are constantly perfecting the overall performance of its designs and technology at its demonstration and R&D facility in Malta. The systems we offer are the result of many years of research and client feedback. Our online monitoring systems allow our staff to provide technical support to clients' projects all over the world.

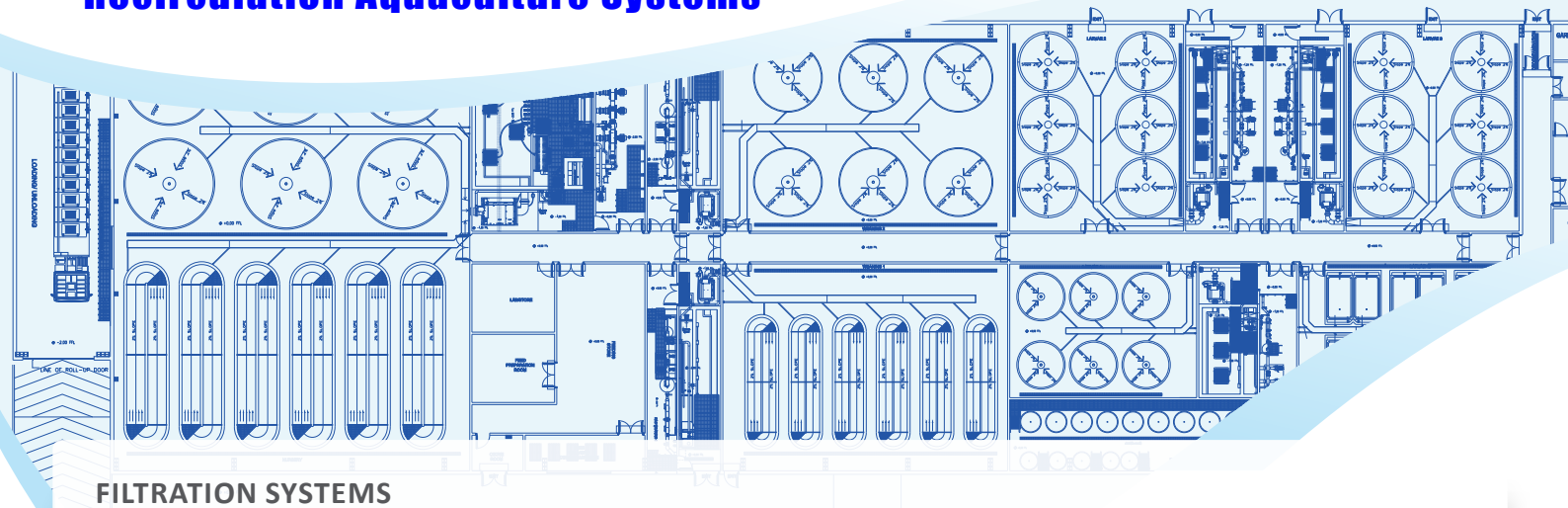


ENGINEERING

Our resident team of engineers and architects tailor projects to every requirement, supporting the client from start to finish on all technical and biological aspects, including:

- Feasibility studies and project budgeting
- Conceptual planning using 3D CAD software
- Simulation and validation using Computational Fluid Dynamics (CFD)
- Bill of Quantities (construction and technology selection)
- Full RAS design, including bio planning
- Civil works design; including structural, electrical & HVAC
- Installation; including third-party Quality Control
- Commissioning and technical training
- Online technical and biological support

Recirculation Aquaculture Systems



FILTRATION SYSTEMS

As a result of our own extensive research and development, we have developed some of the most advanced and cost-effective filtration solutions available on the market today. Filtration modules that can process from 1m^3 up to 25,000m^3 of water per hour are available, as well as custom-designed solutions that are specific for each client's requirements and budget.

HATCHERY TECHNOLOGY

Using the very latest technology **AquaBioTech Group**'s research facilities host several recirculating systems that are able to function as a fully operational hatchery. Studies using our 'in-house' capabilities have developed new techniques for improving hatchery production, efficiency, and knowledge. Our facility provides staff with valuable practical knowledge of how systems perform, therefore assisting our clients in providing continuous technical and operational support.

GROW-OUT TECHNOLOGY

Our large-scale recirculating aquaculture systems are designed to produce optimal performance in terms of production, energy consumption and water discharge reduction. Complete systems are designed with biosecurity as a priority and include integrated, online monitoring systems to enable our staff to provide remote support and advice to the client, long after the onsite training has been completed. The technology retains fundamental design aspects that we have found to be successful and adaptable to clients of varying needs and to species-specific requirements.

3D COMPUTER AIDED DESIGN

All projects undertaken are planned using the very latest CAD software and 3D modelling tools. This technology allows for a complete visualisation of the proposed project and integration of all aspects of the construction. Computational Fluid Dynamic (CFD) software is used to test, optimise and validate designs.

PROJECT MANAGEMENT & OVERSIGHT

Entire projects are managed by our team, including coordination of deliverables with various contractors. After project completion, we can provide support staff to optimise the production of the chosen species.

AquaBioTech Group offers other services including comprehensive project feasibility studies, investment assistance packages, technical auditing and due-diligence assignments, aquaculture insurance audits, environmental guidelines, and Environmental Impact Assessment (EIA).





