Principles of aquaculture

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DESCRIPTION

Aquaculture, the growth of fish and seafood, is one of the fastest developing sectors of the global food product industry. The decimation of ocean fisheries through decades of over fishing and the passion to deal more seafood cheaply has led to the quick privatization of sea waters on an industrial scale. This speed of increase in demand for fish and fish products has outpaced our regulatory agencies capability to manage arising environmental and human health risks from the aquaculture production. Though presented by the industry as a "result" to over fishing, the overwhelming proof is that aquaculture isn't relieving any pressures on wild fisheries. Rather, man made aquaculture has boosted the reduction of our ocean resources, added new threats to our marine ecosystem and wildlife, and created new troubles to human health and the environment all to the detriment of the traditional fishing husbandry and the public.

Industrial aquaculture has resulted in a far reaching variety of environmental consequences, including the escape of farmed fish from their limitation that threatens native wild fish populations; the spread of deadly sickenesses and parasites; the overfishing of wild fish to feed carnivorous farmed fish and the contamination of our ocean from the inputs and outputs of fish farming.

Industrial aquaculture also raises significant human health and food safety concerns. The antibiotics, pesticides and other chemicals that are heavily used to help disorder and parasites in fish farming can accumulate in fish tissues. Also, the feed given to fish in aquaculture is made from wild caught fish that may be heavily polluted with dioxins and Polychlorinated Biphenyls (PCBs). Studies have found farmed fish to be less healthy than their wild counterparts, refuting the contended advantages of eating aquaculture sourced seafood.

Center for food safety works to secure and enrich aquaculture oversight, furthering policy and cultural dialogue with authoritarian agencies, consumers, chefs, grocers, fish retailers and legislators on the critical need to safeguard public health and environment from industrial aquaculture.

Boosting wild stocks of fresh and seawater species breeding fish for zoological park and aquarium types of aquaculture there are two main methodologies used in fish farming in a natural environment and in onshore tanks. Fish farming in a natural atmosphere fish like salmon, trout, ocean bass, sea bream are farmed in floating cages anchored to the seabed. Fish like trout, arctic char or smolt are raised in ponds or cages in fresh water. These will also be anchored in place. In onshore tanks this is where fish grow in special rearing tanks filled with water. The tanks will be filled with either fresh water or seawater, depending on the species being farmed. In some farms the water is used only once (open system), in others the water is recycled (closed or recirculation system).

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Shrimp farming is carried out in fresh water, in ponds or open ground tanks, in tropical and tropical zones. Shellfish such as oysters, mussels and clams can be grown on rope or in pockets. Algal culture is the name for the farming of species of algae.