Sea Grant supports

SUSTAINABLE FISHERIES AND AQUACULTURE

THROUGH APPLIED RESEARCH AND EXTENSION

Sea Grant 50 YEARS

Photo: Oregon Sea Grant

An oyster farmer in Oregon harvests animals for market. Research by Oregon Sea Grant found that a mutant strain of Vibrio tubiashii and other bacterial products are toxic to oyster and mussel embryos. Sea Grant recommends that hatcheries adopt clean and controlled husbandry techniques to mitigate Vt outbreaks.

$9 M
FY16 Sea Grant funds dedicated to aquaculture research and extension

2,500
fishers trained and certified by Sea Grant in 2015 on safe seafood handling techniques (HACCP)

59,000
fishers adopted responsible harvesting techniques as a direct result of Sea Grant extension in 2015

ARTIFICIAL BAIT TO CONSERVE HORSESHOE CRABS

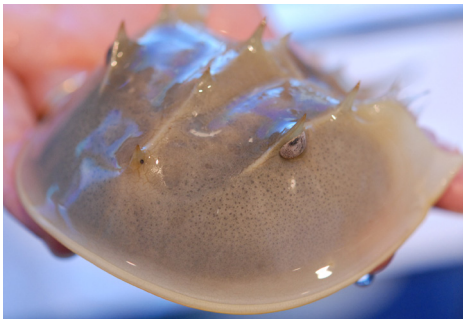
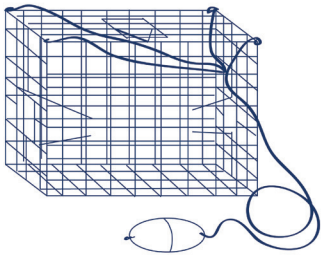


Photo: Louisiana Sea Grant

A horsehoe crab is held by a Sea Grant instructor during a course on horseshoe crab conservation.

Delaware Sea Grant researchers developed and tested bait for eel and conch fisheries that greatly reduces their reliance on harvested horseshoe crabs. Horeseshoe crab populations have declined in large part due to harvesting of eggs for bait. Field trials are now complete and catch rates were similar for the new (artificial) and traditional (live horseshoe crabs) bait, demonstrating the utility of the new bait to the wild harvest fisheries. The recipe for alternative bait developed by Delaware Sea Grant has been adapted and scaled up by commercial entities. The successful field trials support widespread use of this alternative bait.



Sea Grant researches and trains fishers on new and effective gear. Sea Grant also coordinates efforts to remove derilect gear.

Sea Grant coordinates and supports direct market programs to connect fishing professionals with consumers, chefs, and others.

Sea Grant provides technical assistance on informing management plans, navigating permitting processes, and supporting a sustainable domestic aquaculture industry.

30 YEARS OF EXTENSION BUILDS INDUSTRY IN ALASKA

It's often difficult to convey the deep and lasting impacts a Sea Grant Extension has on the individuals, places, and industries with which he or she works. In Alaska, Ray RaLonde works as the Alaska Sea Grant Marine Advisory Aquaculture Specialist. For over 30 years, RaLonde has assisted Alaska's shellfish farmers through education and training, new method application, and easing of site selection and permitting processes. He has helped the industry grow from a single farmer in 1988 to over 60 farms, seven nurseries, and two hatcheries in 2014. Also in 2014, 34 operations yielded a record-high $1,174,802 in shellfish sales. RaLonde's dedication led, in part, to the establishment of the Alaska Mariculture Initiative, a multi-partner effort to set goals, gain funding, and grow to a billion dollar industry.

FIRST OYSTER HATCHERY IN GEORGIA

Georgia Sea Grant, with support from the National Sea Grant Aquaculture competition and others, opened Georgia's first oyster hatchery. The Hatchery Project exposes local fishermen to sustainable oyster aquaculture practices based upon hatchery produced spat. In its inaugural year, ten growers were provided with a stable supply of oyster spat as well as technical guidance for a sustainable harvest of single oysters. The 100,000-500,00 oysters grown in 2015 have an estimated dock value of $75,000. Five to eight million oysters are expected to have an estimated market value of $1.6 million. Georgia was once the largest wild oyster producer in the country harvesting more than eight million pounds of oyster meat in 1908. The industry declined in the 1950s, and by the 1960s, processing canneries had closed.

HAGFISH BY-CATCH REDUCTION IN CALIFORNIA

California Sea Grant administered a project to investigate how trap hole diameter can help conserve hagfish stocks. By interviewing hagfish fishermen, sampling their catch, and ultimately testing this information on the water, the project was able to zero in on the right trap hole diameter to retain high quality catch, yet allow juveniles to swim free. The results of this project were adopted into a new hagfish trap regulation effective January 2015, ensuring that future generations of hagfish and fishermen alike will continue to thrive.

NOAA Sea Grant

Read more details on these stories and more by visiting seagrant.noaa.gov and searching under Impacts.