



# Asian Clam (*Corbicula fluminea*)

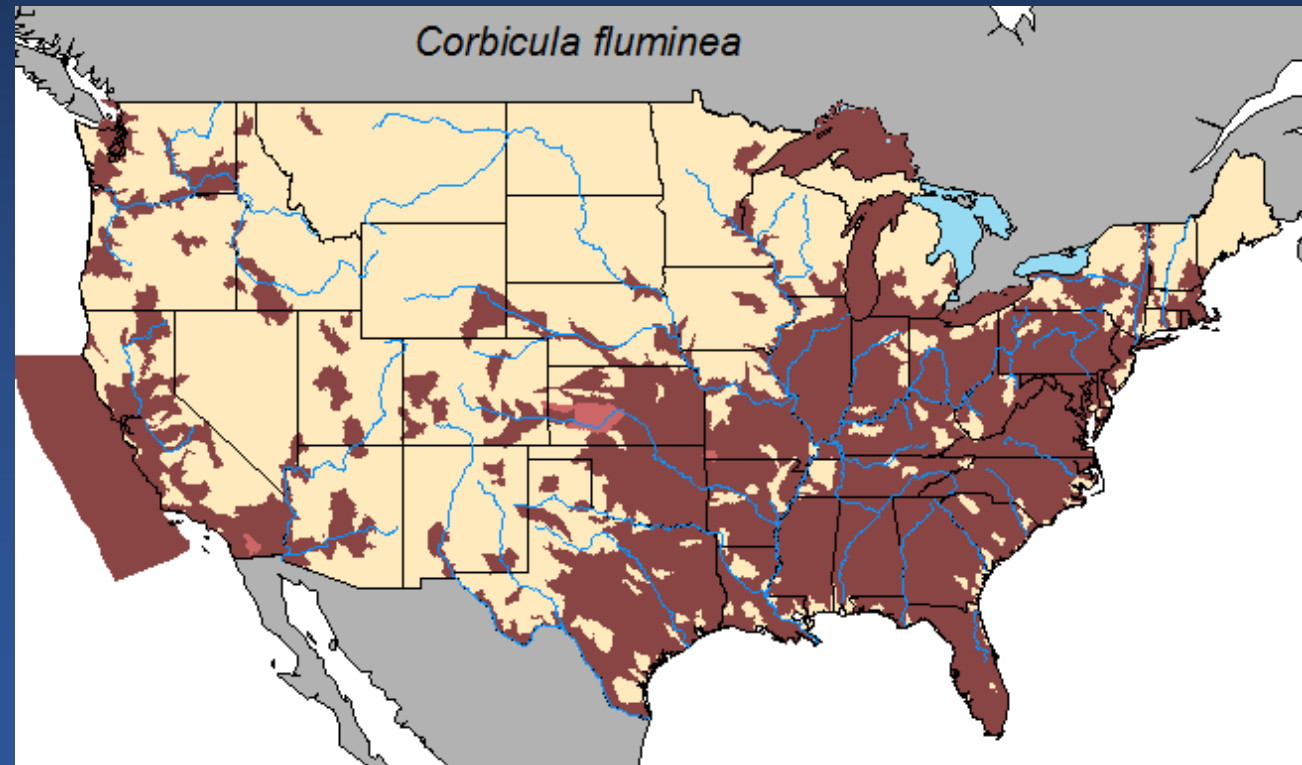
Native to fresh waters of eastern Asia & Africa.

Likely introduced to west coast of NA ~1928, presumably as a food

Live clams first detected in US waters in 1938 in the Columbia River, WA.

Spread to Atlantic coast by the 1960s

Currently found in 46 States

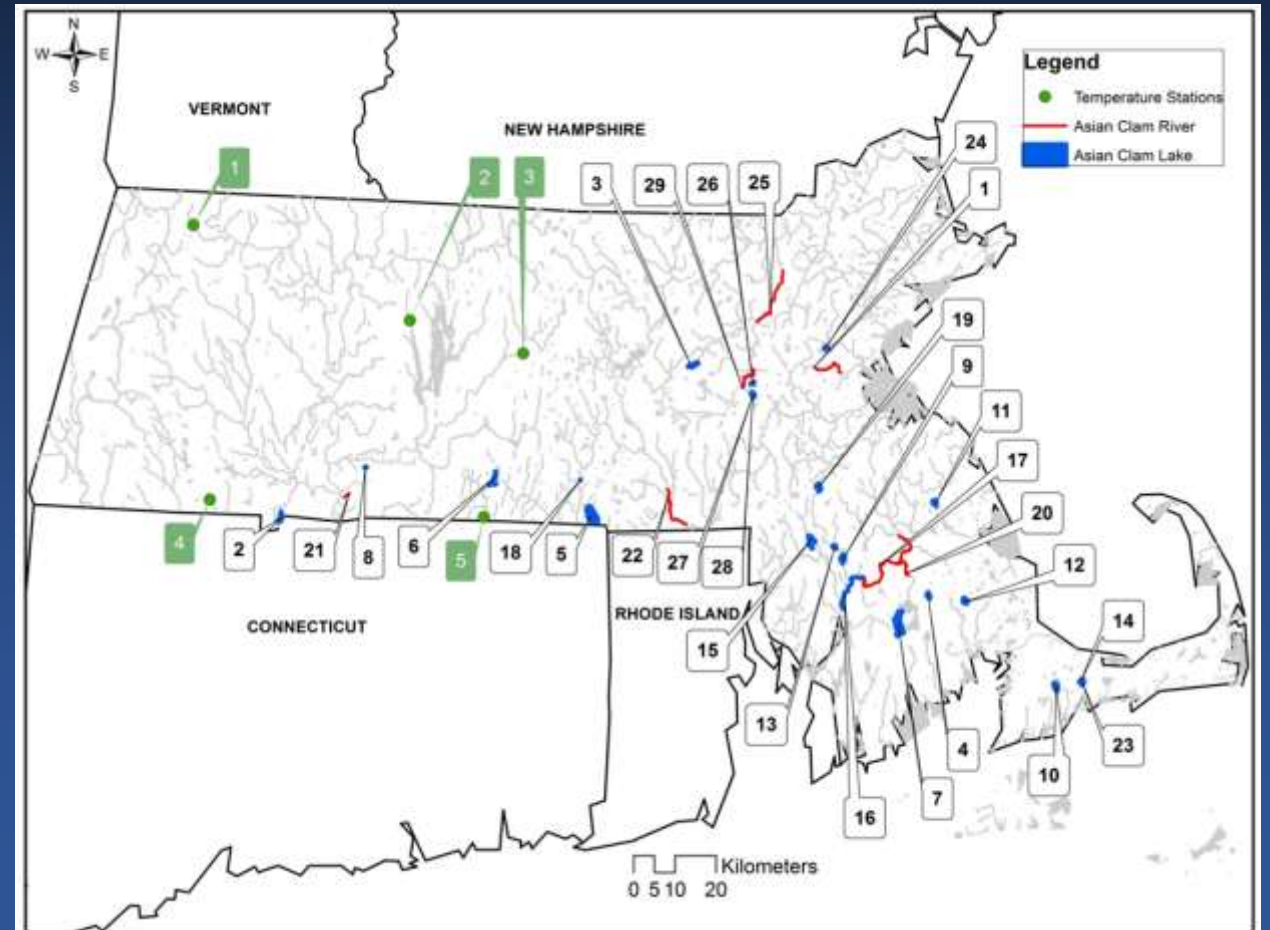


First documented in New England by early 1990 in the Connecticut River

In MA, first found in the Charles River in 2001

Now considered to be “established”

Documented from 28 waterbodies





Occurs in both lake and riverine systems

Prefers areas with sand and gravel substrates.

Rarely found on hard surfaces or in excessively silty areas.

Extremely sensitive to low oxygen conditions

Can tolerate a wide range of temperatures,

but require water temperatures of  $\geq 60^{\circ}$  F for reproduction.



**Invasive success** is attributable largely to its life cycle traits:

**Rapid growth**

**Early sexual maturity**

**High fecundity**

**Hermaphroditism**

**Extensive dispersal capacities**

## Reported Issues

Reduced available habitat for native species

Competition for benthic food resources

High filtration rates limiting planktonic food & sperm/juveniles of unionids

Potential to alter nutrient cycles by making P and N more available in the water column

Associated with dense algal blooms

Massive mortality events that can affect water quality

Bioaccumulation of pollutants

Biofouling of intake pipes & recreational beaches

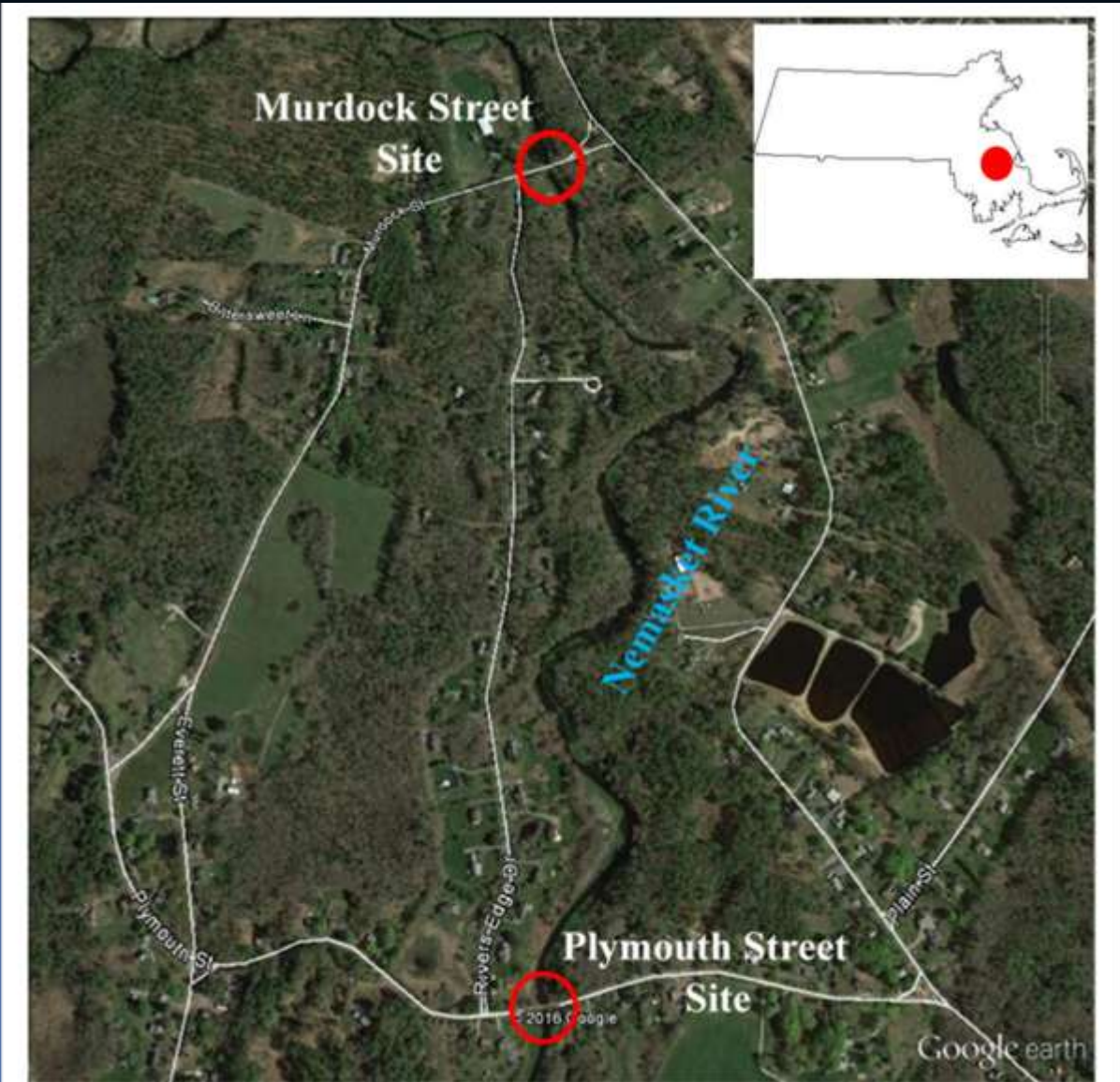


*Corbicula fluminea* (Asian Clam)



*Elliptio complanata* (Eastern Elliptio)

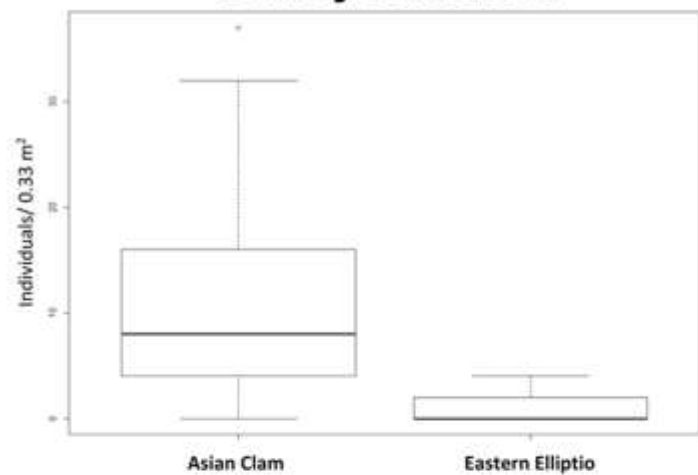




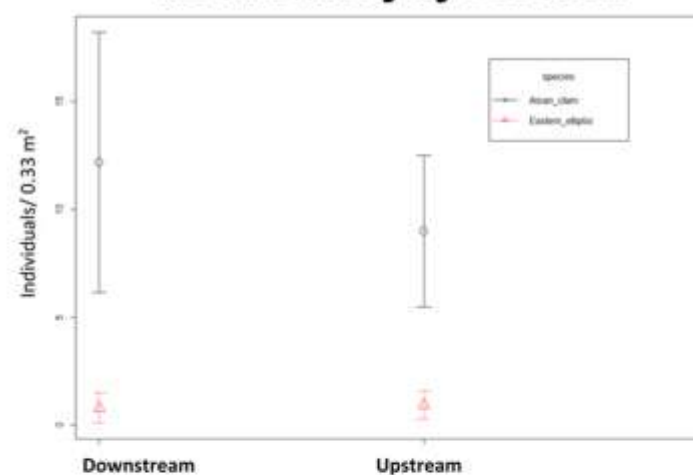
**Figure 3.** Two sampling locations of Nemasket River, Middleboro, MA



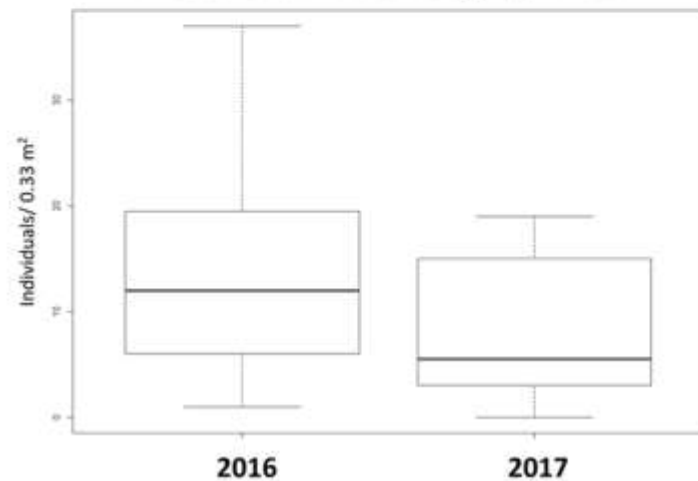
### Density of bivalves



### Mean Density by Location



### Asian Clam Density by Year



### Mean Density by Year

