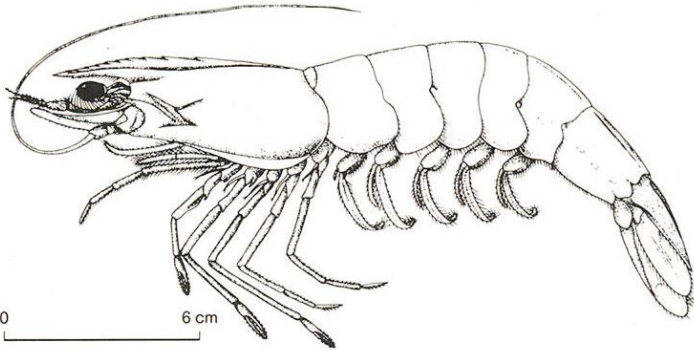


Brown shrimp

Penaeus aztecus
Camaron cafe norteno



Description

Range: The brown shrimp, a decapod crustacean of the family Penaeidae, is found in the western north Atlantic from Martha's Vineyard, Massachusetts, to Florida, and in the Gulf of Mexico to the Yucatan Peninsula. Highest concentrations of this species occur off the coasts of Texas, Louisiana, and Mississippi.

Habitat: The brown shrimp, a benthic and estuarine-dependent invertebrate, is found from shore to depths of 110 meters, but is most abundant between 30 and 55 meters. This species favors mud or sandy mud substrates. Juveniles are also benthic and occur primarily in shallow marsh areas and estuarine bays.

Feeding and Behavior: This omnivorous species feeds on detritus and algae, benthic polychaetes, molluscs, crustaceans and other invertebrates, and zooplankton. The species feeds at night. The brown shrimp itself is an important source of food for many other species.

Reproduction: In Gulf waters, the spawning season varies with depth. At depths greater than about 14 meters, spawning occurs year-round with two peak periods from October to December and from March to May. Juveniles remain in estuarine nursery areas until mature.

Movement: The brown shrimp moves offshore in winter, returning inshore in spring. There is also movement from estuaries to deeper offshore waters as juveniles reach maturity.

Fisheries: This is one of the most important commercial species in the U.S. Gulf of Mexico. Immature shrimp are mainly sold as bait. Major commercial fishing grounds occur off the coasts of Texas and Louisiana.

References: Baxter, R.N., pers. comm.; Brown, A., Jr., pers. comm.; Christmas, J.Y., and D.J. Etzold, 1977a; Cook, H.L., and M.J. Lindner, 1970; Darnell, P.M., R.E. Defenbaugh, and D. Moore, 1983; Gulf of Mexico Fishery Management Council, 1980d; Kennedy, F.S., pers. comm.; Klima, E.F., pers. comm.

- Adult Area (Year-round)
- Adult Area (Spring, Summer, Fall)
- Major Adult Area (Year-round) and Commercial Fishing Ground (Year-round)
- Major Adult Area (Spring, Summer, Fall) and Commercial Fishing Ground (Spring, Summer, Fall)
- Major Adult Concentration (Year-round) and Major Commercial Fishing Ground (Spring, Summer, Fall)
- Nursery Area (Year-round)
- Major Nursery Area (Year-round)
- Commercial Fishing Ground (Summer)

Year-round spawning occurs about 14 meters seaward throughout adult areas.

References

Darnell, R.M., R.E. Defenbaugh, and D. Moore, 1983; Guthertz, E.J., pers. comm.; Hildebrand, H.H., pers. comm.; Osborn, K.W., B.W. Maghan, and S.B. Drummond, 1969; US DOC, NOAA, 1980.

Strategic Assessment Branch
Ocean Assessments Division
Office of Oceanography and Marine Assessment
National Ocean Service/NOAA
and the
Southeast Fisheries Center
National Marine Fisheries Service/NOAA