Safe Eating of Shellfish

Fish and other seafood are healthy and tasty. But seafood does carry some risk if it is not handled, stored or prepared

properly. Eating raw or undercooked seafood, especially clams, mollusks, oysters and scallops can be dangerous. Seafood such as these can harbor bacteria that are ingested from their habitat. Many times, their habitat is in areas of high water pollution from towns and cities. As these shellfish feed, they ingest bacteria along with the nutrients they draw from the water. The bacteria they ingest are often harmless to the shellfish but can be dangerous to people who eat the infected seafood.

One common type of bacteria found in undercooked seafood is *Vibrio parahaemolyticus*. Once ingested by the shellfish, this bacteria continues to multiply, even after the seafood is refrigerated, awaiting preparation. The only way to kill Vibrio is by thoroughly cooking the seafood. If infected seafood is eaten raw or undercooked, you ingest bacteria with each bite of your dinner. If you think you have shellfish poisoning, contact your local health department.

Clams, mussels and oysters in the shell are alive and the shells close tightly when tapped and live crabs, lobsters and crayfish will move their legs. Shucked oysters are plump and have a mild odor, a natural creamy color and clear liquid or nectar.

Do not cook or eat shellfish that have died during storage. Gaping shells indicate that the shellfish are dead and not edible. Dead shellfish spoil rapidly and develop off-flavor and off-odors.

If you plan to store shellfish, The Food and Drug Administration (FDA) recommends placing shellfish on ice or in the refrigerator or freezer soon after purchasing. If seafood will be used within 2 days after purchase, store in the refrigerator. Otherwise, wrap it tightly in plastic foil or moisture proof paper and store in the freezer.



Cleanliness is Important:

Always wash hands thoroughly with hot, soapy water before preparing foods and after handling raw seafood. Don't let raw meat or juices touch ready-to-eat foods, either in the refrigerator or during preparation. Don't put cooked foods on the same plate that held raw seafood. Always wash utensils that have touched raw seafood with hot, soapy water before using them for cooked seafood. Wash counters, cutting boards and all surfaces raw seafood has touched.

How do I cook live (in-shell) oysters, clams and mussels?

Clams, oysters and mussels can be baked, boiled, broiled, deep fried, grilled, poached, sautéed, steamed or stir fried. When boiling or steaming live clams, oysters and mussels, use small pots and do not overload them because the shellfish in the middle may not get fully cooked. The FDA recommends:

- Clams, mussels and oysters in the shell will open when cooked. Boil shellfish for 3 to 5 minutes after shells open, or
- Place shellfish in pot with boiling water and steam for 4 to 9 minutes.
- Discard any shellfish that do not open during cooking.
- Shucked shellfish (clams, mussels and oysters without shells) become plump and opaque when cooked thoroughly and the edges of the oysters start to curl. Boil or simmer shucked oysters for 3 minutes, fry them in oil at 375 °F for 3 minutes, broil 3 inches from heat for 3 minutes or bake them for 10 minutes at 450 °F.
- Scallops turn milky white or opaque and firm. Depending on size, scallops take 3 to 4 minutes to cook thoroughly.
- Raw shrimp turn pink and firm when cooked.
 Depending on the size, it takes from 3 to 5 minutes to boil or steam 1 pound of medium-sized shrimp in the shell.

