

**The deep (hydrothermal) vent community is made up of a diverse group of organisms.**

**Producers include:**

- chemosynthetic bacteria
- archaea

These producers do not use sunlight as an energy source. Instead, they break down the chemical bonds in hydrogen sulfide (emitted from the deep vents) to generate organic matter through chemosynthesis.

**Primary consumers include:**

- giant tubeworms (*Riftia pachyptila*) and other tubeworms
- hydrothermal vent clams (*Calyptogena sp*)
- shrimp
- crabs

Chemosynthetic producers live within the body cavities of the giant tubeworms, which may reach 1.5 metres in length. Producers are also found in the gills of hydrothermal vent clams. The shrimp and crabs eat the chemosynthetic micro-organisms directly.

**Higher-level consumers include:**

- sea snails
- lobsters
- fish
- octopus
- crabs
- sea spiders
- limpets
- shrimp
- anemones

Higher-level consumers may feed on primary consumers or on each other.

# The Deep Vent Community

A food web for a deep vent community can be extremely complex, as shown below.

