

# Food Chains in Antarctica

## Discussion Questions:

- 1) What do animals eat in Antarctica?
- 2) What is a predator?
- 3) What is a scavenger?
- 4) How does the food chain work in Antarctica?



# Who eats who?

The Antarctic Region is a harsh environment. Animals that live in this environment often rely on each other for sources of food.

Small sealife often rely on microscopic plant and animal life that swim in the cold Antarctic waters.

Many larger Antarctic animals spend a great deal of time in the water. They catch a variety of sealife including krill and small fish in order to survive.

**Predators** hunt other animals that are smaller than themselves. Seals, like the leopard seal, can be ferocious predators and will prey on penguins and smaller seals.

**Scavengers** are animals that will eat anything they can find. They might steal eggs from other animals or squabble over the remains of a predator's kill.

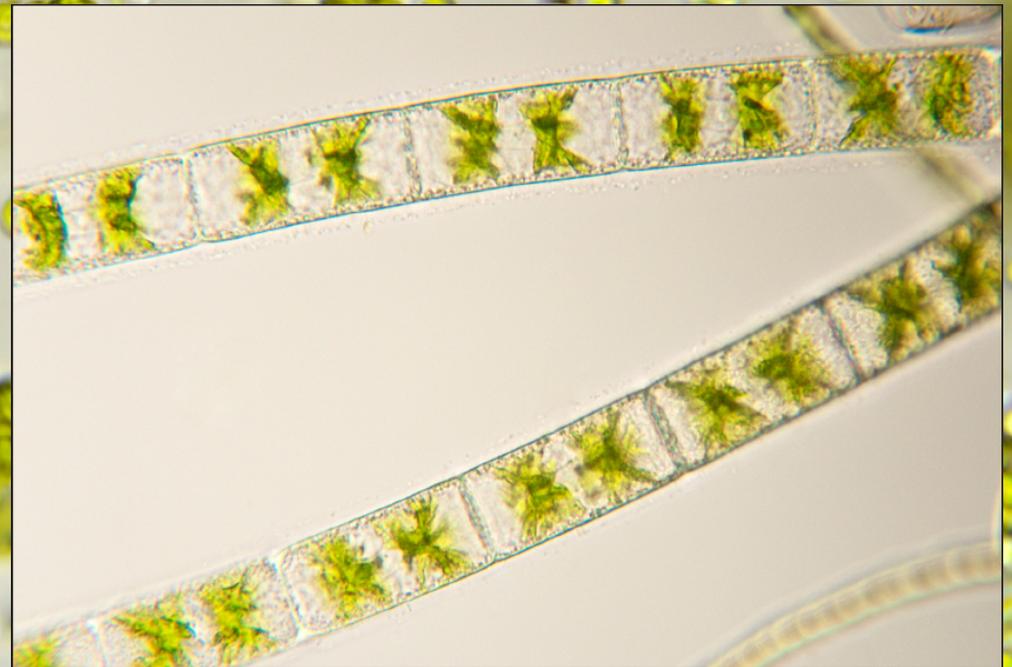
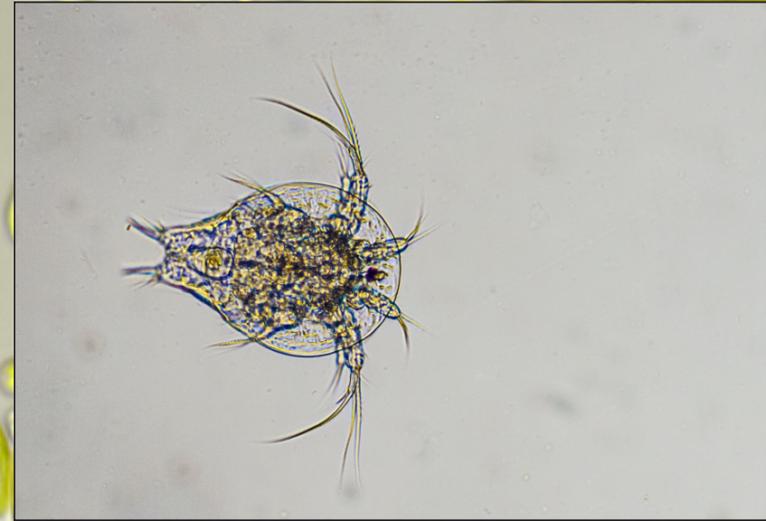


## ***Phytoplankton***

Phytoplankton are microscopic plant materials that can be found in the water. Algae is a common type of phytoplankton. They grow using energy from the sun.

## ***Zooplankton***

Zooplankton are microscopic animals that live in water. Copepods are examples of zooplankton. These tiny creatures can eat phytoplankton plant matter and some eat other zooplankton.

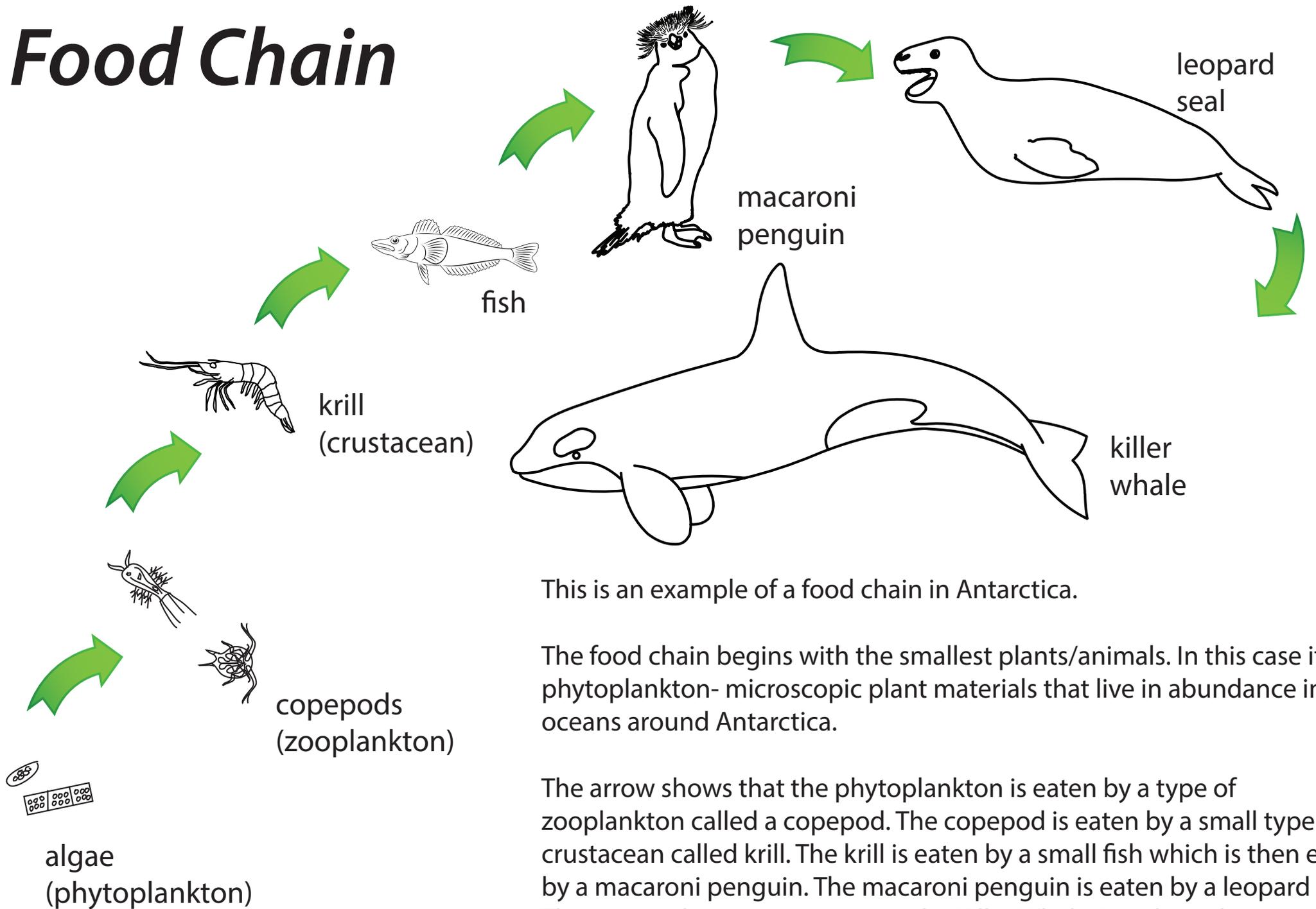


Small crustaceans such as krill are a major source of food for many Antarctic animals.



Animal	Diet	Predators	Animal	Diet	Predators
 emperor penguin	fish, squid, antarctic krill,	leopard seals, killer whales, seabirds	 brown skua	eggs and young of Adelie penguins, fish, molluscs, antarctic krill	killer whales, leopard seals
 gentoo penguin	small fish, squid, antarctic krill	leopard seals, killer whales, sea birds	 albatross	fish, squid, octopus, jellyfish	top predator
 macaroni penguin	small fish, antarctic krill	leopard seals, fur seals, killer whales, seabirds	 kelp gull	fish, molluscs, crustaceans, chicks and eggs of other seabirds	killer whales, leopard seals
 leopard seal	penguins, small crabeater, weddell and fur seals, fish, squid, antarctic krill	killer whale	 phytoplankton	energy from the sun by photosynthesis	zooplankton, krill, fish
 crabeater seal	antarctic krill, fish, squid, crabs	leopard seals, killer whale	 zooplankton	phytoplankton, bacteria, other zooplankton	other zooplankton, krill, fish
 elephant seal	fish, squid	killer whales, large sharks	 krill	plankton	fish, squid, whales,
 antarctic fur seal	antarctic krill, fish, squid	killer whales, leopard seals	 squid	small fish, antarctic krill	seabirds, seals, sperm and killer whales
 killer whale	minke whales, penguins, seals, fish, squid, octopuses, sea birds	top predator	 antarctic toothfish	small fish, squid, crabs, krill	weddell seals, sperm whales, killer whales
 minke whale	zooplankton, antarctic krill, small fish	killer whales, large sharks	 mackerel icefish	small fish, plankton	antarctic fur seals, gentoo penguins

# Food Chain



This is an example of a food chain in Antarctica.

The food chain begins with the smallest plants/animals. In this case it is phytoplankton- microscopic plant materials that live in abundance in the oceans around Antarctica.

The arrow shows that the phytoplankton is eaten by a type of zooplankton called a copepod. The copepod is eaten by a small type of crustacean called krill. The krill is eaten by a small fish which is then eaten by a macaroni penguin. The macaroni penguin is eaten by a leopard seal. The top predator in Antarctica is the Killer Whale. It is the only animal big enough to be able to eat the leopard seal.