

## **CHAPTER 9**

## WHO AM I? (general characteristics)

When trying to catch a particular fish, if we know their **environmental niche** and how they have **adapted** to it, we can eliminate many unproductive techniques and locations. As an example, burbot have adapted to living in dark, shadowy lakes and river bottoms by developing a keen sense of smell, and their brownish mottled color provides perfect camouflage.

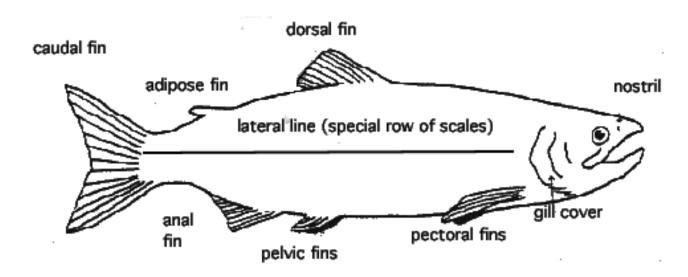
A fish that is well adapted to the shallow, weedy areas of lakes and ponds is the northern pike. Tolerant of warmer waters, these voracious predators have slender green bodies with chain-like markings that blend in with the environment. Illegally introduced northern pike can be extremely destructive to native fish populations.

A fish's color, head and body shape, eye location, mouth and fin shape are all examples of adaptations, characteristics, or features which help the species survive and flourish in certain environments.

It is important that anglers be able to identify the fish they catch, because most laws relate to individual **species**. Laws vary from state to state and between water bodies, so it is crucial to read and understand the rules and regulations booklet before you go out. Laws may range from slot limits, size restrictions, gear restrictions, closed water bodies, or to species which are illegal to possess. These laws were made after scientific consideration of what is best for the area and survival of the different species.

There are other reasons for recognizing what kind of fish you've hooked. Some fish require special handling, like northern pike. These fish have razor-sharp teeth and if you are unaware of this, you might risk a serious cut. All species have different **characteristics** which separate them from the next. Some have spiny dorsal fins or razor-sharp gill plates. Others have spines in their pectoral fins. Knowing this ahead of time will prevent unnecessary stress on you and the fish.

Recognizing general characteristics on a fish can help you identify species. Different parts of a fish can help you with a fish's identity. Below is a diagram of general external characteristics of a salmon.



## Possible extension activities:

- 1) (Creative Exercise) Draw a fish and label the external parts of the fish.
- 2) (Creative Exercise) Design a fish and discuss with a partner the characteristics which make it adapted to its habitat? Where would the fish that you create be found? What color is the fish and why?