

SALAMANDERS, MUDDPUPPY AND NEWT OF WISCONSIN



**Information from
Wisconsin DNR**

Spotted Salamander

(Ambystoma maculatum)

Size: 4 to 7 in.

Description: The dorsal (back) side of the body is generally black or dark brown with prominent yellow spots along the body, often appearing in two relatively distinct rows before merging into

one on the tail. Often there are two orange spots at the base of the head. Its sides have obvious costal grooves and the ventral (belly) area is light gray. Spotted salamanders prefer closed-canopy hardwood forests with heavy ground-layer vegetation because of their cooler microclimates and higher humidities. They spend considerable time underground during the warmer months and can sometimes be found under rotting logs or in humus during spring and fall. Spotted salamanders eat earthworms, mollusks, and arthropods.



Redback Salamander

(Plethodon cinereus)

Size: 3 to 4 in.

Description: Redback salamanders are the most abundant salamander within their range and can be readily distinguished by the dorsal stripe that is normally brick-red in color, although the stripe may sometimes be a dull brown. An occasional

individual may appear unstriped. The sides and bottom of its very slender body are brown to gray and heavily flecked with white. The hind feet have five toes. Redbacks live in woodlands with moist soils and undisturbed ground cover. They are commonly found in or under moist downed logs. Redback salamanders, because of their high densities, are an extremely important component of Wisconsin's northern forest ecosystems. They subsist on arthropods, snails, and annelids.



Blue-spotted Salamander

(*Ambystoma laterale*)

Size: 3 to 5 in.

Description: This is a relatively slender blue-black salamander with whitish or blue spots on its back. It has four toes on its front feet and five

on its hind feet. The costal (rib) grooves are very pronounced along the body between the front and rear legs. A triploid variant of this species, consisting exclusively of females, is found in parts of northern Wisconsin. The variants tend to be longer and paler than the blue-spotted salamanders. Blue-spotted salamanders prefer both northern and southern hardwoods and coniferous forests. They are often abundant in lowland hardwood forests. They tolerate dryer conditions than most Wisconsin salamanders, often living in forests with sandy soils. Adults eat many types of invertebrates including earthworms and insects.



Tiger Salamander

(*Ambystoma tigrinum*)

Size: 7 to 11 in.

Description: This salamander is generally black with variable yellow markings on its head, body, and tail. Newly transformed individuals sometimes have little or no markings on a dark brown

background and sometimes have black spots. Some specimens appear spotted similar to the spotted salamander but many have larger irregular yellow blotches. Tiger salamanders have deep costal grooves and five hind toes. The larvae are sometimes mistaken for mudpuppies, but

mudpuppies only have four toes on their hind feet. Tiger salamanders live in a variety of habitats including grasslands, savannas and woods. They have adapted to living in agricultural and urban landscapes and readily breed in farm ponds. Adults and larvae eat almost anything they can catch and swallow, from earthworms and beetles to young rodents.



Four-toed Salamander

(Hemidactylium scutatum)



Species Overview

Four-toed salamanders (*Hemidactylium scutatum*), a species of special concern, prefer northern and southern hardwood forests and to a lesser

degree, conifer swamps. They overwinter from November through late March by burrowing underground to avoid freezing. Mating can occur in fall or spring at breeding ponds, seepage pools or springs.

In April, females move to microhabitats of dense, usually sphagnum, mosses overhanging the water's edge or dense mosses on downed woody debris overlying the water. Four-toed salamanders will also nest in inundated sedge tussock wetlands when mosses are not present. This species' unique nesting microhabitats appear to limit their abundance. Females remain with their eggs until hatching. Eggs hatch in late May or June and larvae drop into the water where they live until transforming in about six weeks. Four-toed salamanders remain active through November.



Size: 3 to 4 in.

Description: The four-toed salamander is aptly named because it has four toes on its hind feet, while all other terrestrial Wisconsin salamanders have five. Its dark slender, greenish-brown body is mottled with bronze and black, and its tail and limbs are a dull orange with gray markings. The underside is bright white with black spotting. Four-toeds prefer northern and southern hardwood forests and to a lesser degree, conifer swamps. Females nest in dense mosses growing along the water's edge of woodland ponds, springs and seeps or in dense moss on downed woody debris laying over the water. Its unique breeding requirements appear to limit its abundance. Like many other salamanders, their diet consists mainly of insects and other arthropods.

Mudpuppy

(*Necturus maculosus*)

Species Overview

Mudpuppies (*Necturus maculosus*), a species of special concern in Wisconsin, prefer medium to large rivers and lakes. They have a preference for completely aquatic microhabitats such as riprap, talus, boulder/rock piles, beneath flat rocks, under large sunken woody debris, dense mats of

submergents in the deep littoral zone, or eroded pockets of clay lenses in riverbanks. Mudpuppies are active year-round, breed in late fall and spawn in June. Eggs hatch in July or August. This amphibian species is the only host of the state-threatened salamander mussel.

Size: 12 to 16 in.

Description: The mudpuppy is Wisconsin's largest and only totally aquatic salamander. Its permanent deep-red gills are very bushy and feather-like. The dorsal color is rusty-brown or grayish with scattered dark spots. Occasionally, individuals are a dark bluish-black with fine brown speckling. They have four toes on each foot and the tail is finned. Mudpuppies live in lakes and rivers, preferring large flat rock microhabitats although large riprap (piled boulders) may also be used. They also use eroded holes within clay lenses in submerged riverbanks. The mudpuppy is host to the state-endangered salamander mussel, which would presumably go extinct if the mudpuppy was eliminated. Mudpuppies feed on aquatic invertebrates including worms, small fish and other amphibians. The rumor that mudpuppies are poisonous is false.



Central Newt

(Notophthalmus viridescens)

Size: 2.5 to 4 in.

Description: Aquatic adults have smooth skin with orange and black spots on a brownish-orange to light olive-colored background. The ventral side is yellowish with many black flecks. Terrestrial adults are dark olive to brown above with a

whitish ventral side speckled with black flecks. The skin of terrestrial adults is textured like medium sandpaper. The eft, the terrestrial juvenile phase, is primarily a plain brown-orange color with tiny black flecks throughout. Newts live in well-vegetated woodland ponds, roadside ditches, and more permanent riparian wetlands. They eat small earthworms, snails, aquatic insects, and other amphibian larvae.

