



f the 47 species of snakes known from Georgia, only seven species are venomous: Copperhead (*Agkistrodon contortrix*), Northern and Florida Cottonmouth (*Agkistrodon piscivorus* and *Agkistrodon conanti*), Eastern Diamond-backed Rattlesnake (*Crotalus adamanteus*), Timber/Canebrake Rattlesnake (*Crotalus*)

horridus), Pigmy Rattlesnake (Sistrurus miliarius) and Eastern Coral Snake (Micrurus fulvius). No single venomous snake species is found over the entire state, and only a portion of the Georgia Coastal Plain is inhabited by all seven venomous species. Although differentiating among all 47 species can be difficult, becoming familiar with the colors and patterns of Georgia's seven venomous snake species will enable you to determine whether any snake encountered is venomous or non-venomous.

The information in this brochure is intended to aid in identifying the venomous snake species found in Georgia through the recognition of physical traits, pattern and color. Caution should be used when approaching any snake, and snakes found in the wild should only be handled by experienced people after proper identification. Although the possibility of incurring a venomous snake bite should be taken seriously, only the Timber Rattlesnake, Eastern Diamond-backed Rattlesnake and Cottonmouths realistically represent a serious threat to human life. That risk is remote when compared to other environmental hazards, such as lightning. According to the National Weather Service, 588 deaths due to lightning were recorded in the United States from 2002-2021, or an average of 29 deaths annually. According to the American Association of Poison Control Centers, only 46 venomous snake bites reported nationwide during the same period were fatal, an average of two fatalities a year.

Despite the relatively low level of danger posed by venomous snakes, many people consider their fear, no matter how irrational, justification for killing any snake. Venomous and non-venomous snakes serve invaluable roles in the natural environment as predator and prey. In Georgia, it is illegal (a misdemeanor, punishable by up to a \$1,000 fine and a year in jail) to possess or kill many of the state's nongame wildlife species, including non-venomous snakes (O.C.G.A. §27-1-28). It is also illegal to disturb or destroy the dens, holes or homes of wildlife or use explosives, chemicals or other devices to drive wildlife, including venomous snakes, from those homes (O.C.G.A. §27-1-30).





Quick Reference Guide

to Georgia's *Non-venomous* Snakes

Black Racer

Black Kingsnake

Scarlet Kingsnake

Banded Watersnake







Rainbow Snake 🧲



Pine Woods Snake



Southern Hognose Snake



Glossy Crayfish Snake



Black Swamp Snake 🧶



Species of Conservation Concern









Common Garter Snake



Eastern Green 🧲 Watersnake



Southeastern **Crowned Snake**

State-protected





Queen Snake



Smooth Earth Snake



Brown Snake

Eastern Indigo Snake (

Eastern Kingsnake

Eastern Milk Snake

Plain-bellied Watersnake

Rough Earth Snake



Eastern Worm Snake







Scarlet Snake



Northern Watersnake



Red-bellied Snake



Brahminy Blind Snake



(Black Phase)

Eastern Ribbon Snake



Brown Watersnake



Ringneck Snake

Federally Protected

Recognizing a snake's color and pattern (presence or absence of encircling rings, bands, blotches or longitudinal stripes) may be the best way to identify Georgia's snake species, although the appearance of some can vary significantly by individual and geographic area. These photographs show a fairly characteristic example of each species but do not account for variations in appearance. Also, the young of several species, such as the Eastern Rat Snake and Black Racer, are more boldly patterned than adults.



(Yellow Phase)

Eastern Rat Snake







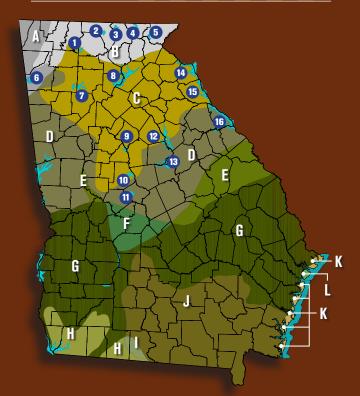


Striped Crayfish Snake 🔵



Distribution of Venomous Snakes in Georgia

	A	B	C	D	E	F	G	H		J	K	L
Copperhead												
Cottonmouths	0			•	•	•	0	•	•	•	•	•
E. Diamond-backed Rattlesnake						•	•	•		•	•	•
Timber Rattlesnake	0	•	•	•	•	•	0			•	•	•
Pigmy Rattlesnake			•	•	•	•	•	•	•	•		
Eastern Coral Snake					•		•	•	•	•		•



Major Georgia reservoirs on the edge or outside of the known range of Cottonmouths

Carters Lake	1	Lake Burton	5	Jackson Lake	9	Lake Sinclair	13
Blue Ridge Lake	2	Weiss Lake	6	Lake Juliette	10	Lake Hartwell	14
Nottely Lake	3	Allatoona Lake	7	Lake Tobesofke	e 1	Lake Russell	15
Chatuge Lake	4	Lake Lanier	8	Lake Oconee	12	Clarks Hill Lake	16



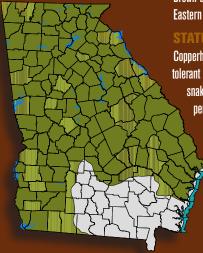
CAUTION: Species ranges depicted reflect knowledge of venomous snake distribution as of 2018. Range margins are estimated and people using this brochure should be cautious when approaching any snake that has not been identified.

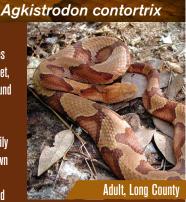
Copperhead, Highland Moccasin

DESCRIPTION: Medium-sized snakes reaching a maximum length of about 4.5 feet, but most are less than 3 feet. The background coloration is usually light brown or gray, but individuals range from rusty orange to pinkish to nearly black. This species is easily identifiable by a pattern of 10-21 dark-brown hourglass or saddle-shaped crossbands, which are wider at the sides of the body and become narrower along the back.









HABITAT: Occur in most forested habitats but are particularly common on rocky wooded hillsides in the mountains and swamp and river edges in the Piedmont and Coastal Plain. Habitats with abundant logs, leaf litter, and rocks for cover are favored, while open habitats such as old fields and

NON-VENOMOUS SPECIES OFTEN CONFUSED WITH:

agricultural areas are generally avoided.

Gray Rat Snake; Eastern Rat Snake (yellow phase); Corn Snake; Northern, Brown and Banded Watersnakes; Eastern Hognose Snake.

STATUS: Uncommon to common. Copperheads are apparently more tolerant of urban development than many snake species. Populations often persist in suburban neighborhoods as long as some patches of forest remain.

> Predicted Species Range Documented County Occurrence Outside of Species Distribution

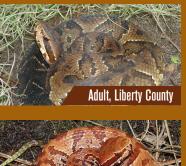
Cottonmouth, Water Moccasin

Agkistrodon piscivorus & Agkistrodon conant

DESCRIPTION: Relatively large, heavy-bodied snakes reaching a maximum length of nearly 6 feet, but most are less than 3 feet, 3 inches. Although these snakes are characterized by wide, dark bands along the body on a lighter brown or olive-colored



background, individual coloration varies within and among populations. As Cottonmouths mature, many become very dark and the bands become totally obscured. Many biologists consider cottonmouths to consist of two species – Northern and Florida cottonmouth –



Juvenile, Liberty County

but differentiating the species and their geographic distributions is difficult.

HABITAT: Semi-aquatic. Cottonmouths prefer swamp-like habitats and can be very abundant in these areas. Sometimes found along rivers or in more open areas such as around large lakes. Also, these snakes may move overland long distances and can sometimes be found far from any water source. They generally hibernate in dry, upland areas, often in stump holes.

NON-VENOMOUS SPECIES OFTEN CONFUSED WITH:

Several species of the large watersnakes (genus Nerodia; Plain-bellied, Northern, Brown, Banded and Green) are often mistakenly referred to as Cottonmouths because of their similarity in appearance. However, the dark stripe on the side of the jaw, heat-sensing pit on the face and the behavior of gaping – a defensive posture where the snake opens its mouth wide - are distinctive to Cottonmouths.

STATUS: Abundant.

Predicted Species Range (Combined) Documented County Occurrence Outside of Species Distribution



Eastern Diamond-backed Rattlesnake

DESCRIPTION: Georgia's heaviest-bodied and one of the state's longest snakes, reaching or possibly exceeding 7 feet, but more typically measuring 3-5 feet in total length. The tail has 3-10 brown and white bands and a "rattle" (one or more loose rings of hard keratin) that



Crotalus adamanteus

makes a loud whirring noise when shaken. Upper surface of the body is patterned by a long row of 24-35 dark brown, diamond-like blotches fringed by thin yellow to cream borders. These blotches are broader than long and are linked together at their tips.



HABITAT: Eastern Diamond-backed Rattlesnakes occupy upland habitats with an open canopy, especially native longleaf pine forests on sandhills, clay hills and flatwoods. Found in numbers on barrier islands, especially within inter-dune meadows containing dense bunch grasses alternating with shrub thickets

and in the dense edges of saltmarsh. Also found in mixed pine-hardwood forests that develop on abandoned agricultural sites, and in and around open woodlots, brushy pasture borders and abandoned homesites in suburban and rural areas. However, these snakes almost never enter houses.

Rare, Georgia Species of Concern. Human impacts have caused the species to decline throughout its range. Habitat loss, fragmentation and degradation are the most serious threats to the species because its upland habitats are in high

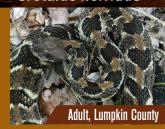
demand for agriculture, silviculture and residential development. Unfortunately, these rattlesnakes are killed by most people whenever they are encountered. The once widespread (and now illegal) practice of gassing Gopher Tortoise burrows to kill rattlesnakes or evict them for use in "rattlesnake roundups" often harms this species, and is a detriment to the large assemblage of up to 300 other animal species that use tortoise burrows.

> Predicted Species Range Documented County Occurrence Outside of Species Distribution

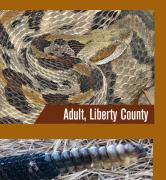


Timber/Canebrake Rattlesnake Crotalus horridus

DESCRIPTION: Large, heavy-bodied snakes reaching a maximum length of nearly 6 feet in the Coastal Plain and about 5 feet in the mountains, but most range from 3-5 feet in length. The background color ranges through various shades of pink, yellow, tan, gray, brown and olive to



velvety black. A series of brown to black chevron-shaped crossbands (15-34) typically cross the body. The tail is black and tipped by a segmented rattle. Very dark or solid black individuals are common in higher mountains of the northeastern part of the state but are rare elsewhere.





HABITAT: Common in much of the heavily wooded country of the Coastal Plain, but in more open areas these snakes are primarily limited to wooded stream corridors. The range is spotty on the barrier islands and along the immediate coast. In the Piedmont, distribution is highly fragmented due to habitat loss and Timber Rattlesnakes are primarily associated with heavily wooded stream corridors and small. isolated mountains. In the Georgia mountains, the distribution is somewhat localized around suitable denning sites (including root and stump holes, mammal burrows, old home sites and <u>debris piles, and – especially</u> in upland regions - rock crevices).

STATUS: Common (locally abundant). Common in much of the Coastal Plain but the range is highly fragmented in the Piedmont and under increasing pressure from residential development. Timber Rattlesnakes are hunted to some extent in the mountains, where in manv areas they appear to have <u>declined in rece</u>nt years.

> Predicted Species Range Documented County Occurrence Outside of Species Distribution



Pigmy Rattlesnake Sistrurus miliarius

DESCRIPTION: Smallest of the rattlesnakes. with the maximum total length reported of 31 inches, but pigmy rattlesnakes usually reach a size of 16-23 inches. The background color is usually gray or tan, but occasional individuals can be reddish or almost black in some populations. The pattern consists of a series of light-edged dark blotches or spots (22-45) on the back, as well as from one to three rows of dark spots on the sides. There may be a reddish stripe down the center of the back. The tail is tipped by a segmented rattle; however, the interlocking segments of the rattle are poorly notched compared to other rattlesnakes. and occasionally some individuals lack a rattle.

HABITAT: Found in a variety of habitats at elevations of 0-1,640 feet and ranging from dry sandhills and longleaf pine forests to wet hammocks and seasonally flooded pine flatwoods. In southern Georgia, Pigmy Rattlesnakes specifically thrive in saw palmetto thickets.

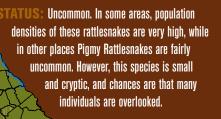






NON-VENOMOUS SPECIES OFTEN CONFUSED WITH: Eastern and

Southern Hoonose snakes.



Predicted Species Range Documented County Occurrence Outside of Species Distribution



Eastern Coral Snake

Micrurus fulvius

DESCRIPTION: Fairly slender snakes reaching a maximum length of 47 inches, but most range from 20-30 inches long. The body is patterned with broad black and red rings, equal in width and separated by narrow yellow rings. The red rings are dotted with numerous black flecks that may coalesce on the back into a pair of



spots. The rounded snout is black and is followed by a broad yellow band across the head and neck. The tail has three or four broad black rings and two to four narrow yellow rings.

HABITAT: Coastal Plain populations are typically associated with sandy upland habitats such as longleaf pine sandhills and pine-saw palmetto flatwoods. Live oak and other hardwood hammocks on well-drained soils may also support populations. Eastern Coral Snakes are absent from extensive wetlands and from vast tracts of pine flatwoods underlain by low, poorly-drained soils. Individuals lead highly subterranean lives and shelter in virtually any type of underground refuge, including Gopher Tortoise burrows and stump holes.

NON-VENOMOUS SPECIES OFTEN CONFUSED WITH:

The Scarlet Kingsnake also has a color pattern of contrasting red, black and yellow or white rings but has a red snout, and the light-colored rings are separated from the red ones by black. The Scarlet Snake has a red, pointed snout; red back blotches that are outlined by black; and a white, unmarked belly. A helpful rhyme to distinguish Eastern Coral Snakes goes, "Red touch yellow, deadly

fellow; red touch black, venom lack."

STATUS: Rare, Georgia Species of Concern. This species is generally distributed and seemingly fairly common in the lower and middle Coastal Plain of southeastern Georgia. Its status in the Piedmont, upper Coastal Plain and in the southwestern portion of the state is poorly known.

> Predicted Species Range Documented County Occurrence Outside of Species Distribution

For additional information, please contact:



WILDLIFE RESOURCES DIVISION

WILDLIFE CONSERVATION SECTION 116 Rum Creek Drive, Forsyth GA 31029 478-994-1438

www.georgiawildlife.com

Production and printing of this brochure made possible by:





UNIVERSITY OF GEORGIA EXTENSION



IN CASE OF VENOMOUS SNAKE BITE

- STAY CALM. Get the patient to the nearest hospital right away! Call 911 or the Georgia Poison Center (1-800-222-1222) immediately.
- 2. TRY TO IDENTIFY THE SNAKE BY SIGHT ONLY. Look for color, patterns and head shape.
- 3. DO NOT TRY TO KILL THE SNAKE; it could bite again.
- KEEP THE PATIENT CALM AND IMMOBILE (preferably lying down).
- 5. KEEP THE AFFECTED LIMB AT AN EVEN LEVEL with the rest of the body.

- 6. DO NOT GIVE THE PATIENT FOOD, DRINK, OR MEDICATION (e.g., pain medications, alcohol, etc.).
- 7. DO NOT USE A TOURNIQUET.
- 8. DO NOT CUTTHE WOUND.
- 9. DO NOT TRY TO SUCK OUT THE VENOM.

I 0. DO NOT PACK THE WOUND IN ICE.

Bites from non-venomous snakes should be washed with warm soapy water; a tetanus shot may be needed.

> Courtesy of Georgia Poison Center www.georgiapoisoncenter.org

Species distribution, range maps and species information are attributed to the Georgia Herp Atlas Project and Georgia Department of Natural Resources.

Content: K. H. Andrews, M. E. Dorcas, M. Elliott, T. M. Floyd, J. W. Gibbons, X. Glaudas, W. H. Martin, D. B. Means, R. A. Moulis, P. Spivey, D. J. Stevenson, J. D. Willson

Photos: R. Bartlett, G. Beaton, R. Birkhead, S. Collins (CNAH), A. Day, T. M. Floyd, S. Graham, G. Greer, R. Gunwald, P. Hill, G. Hilliard, J. B. Jensen, B. Johnston, K. Krysko, T. Luhring, G. Miller, P. Spivey, D. J. Stevenson, D. Steen