

Science Glossary

- albinism**—a condition in which some or all of a bird's feathers are white.
- arthropods**—invertebrate animals, such as insects and spiders, with a segmented body and external skeleton.
- behavior**—the voluntary and involuntary actions of an organism in relation to the natural elements and other organisms in its environment; an organism's set of responses to stimuli.
- binomial nomenclature**—a system using two names to organize all plants and animals into unique categories. First name is the genus, second is the species.
- breeding range**—the geographic area where a bird species can be found breeding and raising young. This is also called the bird's "summer range."
- citizen scientist**—ordinary citizens who collect data to be used for scientific studies.
- classification**—how animals are grouped together according to their shared characteristics and evolutionary relationships.
- common name**—a bird's common name is its non-scientific name. For instance, *Ceryle alcyon* is also known by its common name, Belted Kingfisher.
- diopter adjustment ring**—a small wheel that adjusts a single eyepiece on binoculars; usually found on the right eyepiece.
- distribution**—the geographic locations where a bird is found. Distributions are shown on maps as shaded areas.
- evolution**—ongoing process by which living organisms change over time in response to changing environments. The diversity of life forms we see today is a result of the evolutionary process.
- eyepieces**—on binoculars, the parts that are placed up to the eyes.
- field guide**—an illustrated book with descriptions of birds. Most field guides group birds according to their taxonomic order, instead of alphabetically.
- field mark**—a bird's distinctive colors and patterns used in identification. Breast spots, wing bars (thin lines across the wings), and eye rings (light or dark circles around the eyes) are some common field marks.
- fledgling**—a young bird that has left the nest and is capable of flight.
- flight style**—the way a bird moves through the air; a description of the way a bird uses its wings, the duration of the flight it makes, and the distance it travels.
- focus wheel**—the part of a pair of binoculars which changes the focus of both eyepieces at once; usually the large wheel between the two eyepieces.
- foraging**—the act of searching for food.
- genus**—a classification category. Members of a genus are closely related and often share similar physical characteristics and/or behaviors. Western Bluebird (*Sialia mexicana*) and Eastern Bluebird (*Sialia sialis*) are two species in the genus *Sialia*. Both have blue plumage with red breast feathers in the males, similar bills, and musical calls in flight.



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habitat—the place where a bird (or other animal) lives which provides the food, water, cover, and space that the animal needs to survive. A habitat has many elements such as light, temperature, moisture, plants, and other animals. Examples include wetlands, open woods, and forest edges.

incubation period—the length of time (in days) that the parent bird sits on its eggs in order to keep them warm until they hatch.

invertebrates—animals without a backbone, such as spiders, insects, snails, and worms.

mnemonics—(also known as a mnemonic device) any learning technique that helps an individual to remember information by associating that information with things that are easier to memorize. The most common mnemonics are vocal.

migrant—a bird that makes seasonal journeys. Most migrants move to their breeding grounds each spring, then back to their nonbreeding grounds in the fall.

molt—the shedding of feathers. Birds can molt some or all of their feathers. Newly grown feathers replace the feathers that are shed.

nestling—a young bird that has not left the nest.

nonbreeding range—the geographic area where a bird can be found during the nonbreeding winter months (also called the “wintering range”). Birds that do not migrate have the same range year-round (year-round range).

passerine—the birds in the large order Passiformes, which have perching feet; this group includes all songbirds.

plumage—a bird’s feather colors and patterns.

range map—map showing the geographic area where a species is found.

scientific name—a bird’s Latin name which has two parts—genus and species. For example, the Belted Kingfisher’s scientific name is *Ceryle alcyon*.

sexual dimorphism—males and females appear different from each other.

silhouette—the shape created by a bird’s outline. Silhouettes are shown as dark shapes against light backgrounds.

species—in the taxonomic order, this category is the final and most specific classification. Birds grouped in the same species can breed with each other and generally share common habitats, appearance, and behavior.

species account—the information about each bird that is provided in a field guide. Most species accounts include a bird’s common name, scientific name, size, visual description, distribution map, habits, sound description, and a picture.

taxonomic order—the scientific categories used to group living organisms: kingdom, phylum, class, order, family, genus, and species. These categories are arranged in a hierarchy, with “kingdom” being the most general and “species” the most specific.

taxonomy—system of assigning names and categories to living organisms based on their evolutionary relationships. “Order,” “family,” and “genus” are examples of a taxonomic categories.



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wetland—land that has very wet soil or standing water. Swamps (with trees) and marshes (without trees) are the two main types of wetlands.

year-round range—the geographic area where a bird can be found year-round. This is the total range for a nonmigratory bird; or the overlap zone between breeding and nonbreeding ranges for some migratory birds.

