HOME & GARDEN

Spiders in the Home

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by F.B. Peairs, W.S. Cranshaw and P.E. Cushing [1] (12/08)

Quick Facts...

Spiders feed solely on insects and other arthropods. This makes them beneficial in helping manage pests.

Some spiders wander indoors in the early fall when cooler outdoor temperatures force them to find shelter.

Some spectacular spiders are found in webs outdoors in late summer, particularly the banded argiope and the "cat-face" spiders.

Common spiders found indoors include funnelweb spiders, cobweb spiders, cellar spiders, and sac spiders.

Spiders are beneficial arthropods, that survive by feeding on insects. Oftentimes they are the most important biological control of insect pests in gardens, fields, forests, and homes. However, their presence is a cause of concern to some people. Many people fear spiders beause of stories or myths. Others object to spiders because of their habit of building webs in and around the home. There are a few spiders whose bite require medical attention, but these are very rare in Colorado.

Spiders differ from insects in that they have eight legs (rather than six) and only two body regions (instead of three). The body regions include the cephalothorax (head and legs) and the abdomen. On the head are usually six to eight eyes, often arranged in pairs. The pattern of eye arrangement is characteristic for the different spider families.

Some spiders capture prey by using webs and venom. Others are active hunters that ambush or capture prey. These spiders physically overpower their prey and then use venom to immobilize them.

Life Cycle

Females lay eggs in clusters of up to several dozen. Most cover the eggs with a sheet of tough silk that can attach to almost any surface. The eggsac of many web-spinning species are found in and around the webs which the females usually guard. Females of some species (wolf spiders, cellar spiders, nurseryweb spiders) may carry the eggsac until the eggs hatch.

Young spiders, known as *spiderlings*, emerge from the eggsac and disperse. Many climb to the top of a nearby object, produce long filaments of silk (known as gossamer), and become carried by the wind. This method of dispersal is known as *ballooning*. *S*piderlings can be carried long distances using this method. Because spiders have a great ability to disperse, in addition to other factors that affect their survival, the number of spiders found in an area from one season to another naturally varies. Also, spiders are able to rapidly recolonize areas even if they have temporarily been eliminated.

Most spiders in Colorado have a life cycle that spans one year. However, widows and some wolf spiders can live up to a few years, and tarantulas can survive a decade or more.

Adult male spiders are smaller than females, sometimes dramatically smaller. Males are identified by the presence of an enlarged pair of *palps* (mouthparts) which may appear somewhat like miniature boxing gloves or a fifth pair of legs. The palps are used to transfer sperm. Male spiders are often more commonly found in homes as they tend to wander during the mating season in search of females.

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Common Colorado Spiders

Funnel weaver spiders (Agelenidae)

Figure 1. Funnel web spider.

Funnel weaver spiders, or grass spiders, are the most common spiders found in homes, particularly during late summer and early fall. They produce dense mats of silk in areas such as shrubs, thick grass, or corners of buildings. A central *retreat* (the base of the "funnel') is usually used by the spider which then moves rapidly onto the web when prey enter onto it.

Funnel weaver spiders are harmless but are often mistaken for the brown recluse, a potentially poisonous species that does not naturally occur in Colorado. Funnel weaver spiders differ from the brown recluse in that they have a darker brown color with black markings on the abdomen, lack the characteristic "violin" marking on the cephalothorax, have four pairs of eyes instead of three, have striped legs, and are considerably faster.

Figure 2. Funnel web spider.

Jumping spiders (Salticidae)

Jumping spiders are active hunters. They stalk and pounce on their prey rather than use silk to snare it. They are capable of jumping short (.5 inch) distances, possess large eyes, and the most common species are brightly colored. As with almost all spiders, jumping spiders use silk to lay down a trail, cover its eggs, and construct temporary shelters.

Figure 3. Ground Spider.

Dysdera crocata (Wood Louse Hunter) "Roly-poly Hunter"

This hairless spider is perhaps best marked by its large fangs which it uses to feed on pillbugs (roly-polies) and other hard-bodied prey. When full grown they are about .5 inch in length. *Dysdera* have a generally creamy gray body with distinctly reddish legs and cephalothorax. They live in a silk retreat and hunt at night. Their bite can be painful but they are not aggressive and their venom is not known to cause medical problems.

Figure 4. Jumping spider.

Ground spiders (Gnaphosidae)

Ground spiders, as their common name implies, are most often found under rocks or logs where they build silken retreats and emerge only to hunt. Some species wander indoors when the weather turns cold. Ground spiders are harmless to humans.

Figure 5. Jumping spider.

Cobweb spiders/House spiders (Theridiidae)

Figure 6: Cob web spider.

Cobweb spiders are common inhabitants of dark corners around the home. They have a generally bulbous body and create messy webs with sticky threads. The majority of these spiders are harmless, although one group, the widow spiders in the genus *Latrodectus*, are potentially dangerous. The family also includes spiders in the genus *Steatoda* that are also generally black and sometimes mistaken for widow spiders, but they have a large white band and lack the orange-red hourglass pattern.

Cellar spiders (Pholcidae)

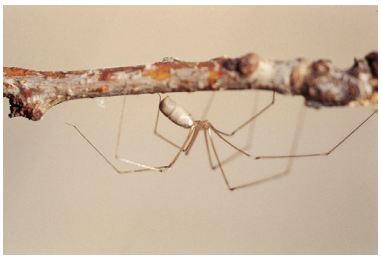

Figure 7. Cellar spider.

Cellar spiders are usually found in dark corners of cellars, crawl spaces, and garages. They are very long-legged and often confused with daddy-long-legs. However, they are true spiders that spin untidy webs which are often quite extensive. When disturbed, they

Figure 7a. Dysdera crotata.

characteristically bounce in the web. Female cellar spiders carry eggs by her jaws in a loose silk sac until they hatch.

Long-legged sac spiders (Miturgidae)

Sac spiders are active hunters. They get their name because they spend daylight hours in a flattened silken sac, typically located in the upper corners of rooms or in wall cracks. Most sac spiders are pale colored. They are usually the most common spider found wandering in homes during fall, particularly at night. *Cheiracanthium* species are suspected as being the most common source of spider bites in homes.

Figure 8. Long-legged sac spider.

Wolf spiders (Lycosidae)

Wolf spiders are active hunters that do not produce a snaring web. They may make a silk lined retreat in soil, under rocks or in other protected sites. Most are grey or brown and some are quite large including the giant wolf spider (*Hogna carolinensis*) and some burrowing wolf spiders (*Geolycosa* spp.) which are commonly mistaken for tarantulas. Smaller species somewhat resemble funnelweb spiders.

An unusual habit of wolf spiders is that the females carry the egg sac on their hind end. The newly hatched young continue to live on her back for the first few weeks of life.

Wolf spiders occasionally enter homes, particularly in areas of new development where their habitat was disturbed. They are normally shy and not dangerous to humans, although large species can bite.

Figure 9. Wolf spider with spiderlings on her back.

Araneus spiders (Araneidae)

Several orb weaving spiders of the genus *Araneus* are commonly found outdoors late in the season. They are usually brownish in color with a large and prominent abdomen that is dimpled and marked. Some species, known as "barn" or "garden" spiders, make geometric webs among vegetation, buildings, windows, or outdoor lighting.

Figure 10a. Cat-faced spider.

The largest and most commonly observed species is the "catfaced" or "monkeyface" spider, *Araneus gemmoides*. Large females may be almost 1 inch in diameter and are generally round with a prominent pair of humps on the back. *Araneus* spiders are harmless.

Figure 10. Burrowing wolf spider.

Banded Garden spider (Araneidae)

The largest and most striking of the orb weaving spiders found in Colorado is the banded garden spider (*Argiope trifasciata*). It is found in late summer and early fall among shrubbery and in gardens where they make a highly symmetrical orb web. Females are generally silvery, with dark and yellow striping. Males are rarely observed and are much smaller than the females. The banded garden spider is harmless.

Figure 12. Banded garden spider.

Figure 11. Tarantula.

Figure 13. Female black widow with egg sacs.

Figure 14. Male black widow.

Figure 15. Brown recluse spider (male) showing distinctive pattern on back.

Tarantulas (Theraphosidae)

Tarantulas are found in southeastern and southwestern Colorado. Mature male spiders are commonly observed when they wander across roads in late summer in search of females. Tarantulas are among the longest lived of all spiders. Females may live for more than 20 years. Populations of tarantulas tend to be localized, where they burrow into soil and feed at night. They do not enter homes and females move only a few feet from their burrow. They may produce a pinching bite if handled. Tarantulas defend themselves by flinging hairs from their abdomen which can be irritating to the touch.

Potentially Dangerous Spiders

Widow Spiders

Widow spiders, particularly the western widow (*Latrodectus hesperus*) are common in Colorado. They usually nest near the ground at dark, undisturbed sites. Window wells, entrances to crawl spaces, old rodent burrows, corners of garages, and abandoned rodent burrows are some of their favorite nesting sites.

The presence of red or red-orange markings on the underside of the abdomen are characteristic of widow spiders. This pattern may be in the form of a distinct hourglass pattern or appear as two separate triangles. The markings may be distinct and bright, or sometimes faint and indistinct. Overall color of the adult females is uniform black, although immature stages and males may have brown, red, and white markings on the back. Some non-poisonous spiders that are commonly mistaken for widow spiders are *Steatoda* species (cobweb spiders), mentioned earlier.

Bites from the widow spider are painful and potentially dangerous because they contain a nerve poison. Fortunately, widow spiders are non-aggressive and rarely bite. When bites do occur they happen when the female is provoked, for example, when an unwitting person presses down on a spider that is resting beneath a log or rock. See fact sheet 5.605, *Western Widow Spider* for additional information.

Figure 16. Brown recluse spider.

Brown Recluse spider

The brown recluse *(Loxoceles reclusa)* is rare in Colorado because of our cold winters and dry climate. However, it is common to areas along the southern Mississippi Valley and are occasionally brought into the state. Brown recluse lives within a loose, messy web in dark corners of buildings.

Brown recluse spiders are pale brown or buckskin colored with long, dark brown legs. A violin shaped dark marking is present behind the head, and the abdomen is uniformly colored. Unlike most spiders, the brown reclude possesses only three pairs of eyes. They are commonly mistaken for funnelweb spiders, certain wolf spiders, and even sun spiders.

The venom of the brown recluse is damaging to human cells. In susceptible individuals a slow-healing, ulcerous wound may form at the bite site. Oftentimes the original bite is not noted, but after a few hours a blister will form and pain develops. For more information see fact sheet 5.607, *Brown Recluse Spiders in Colorado: Recognition and Spiders of Similar Appearance.*

Figure 16. Hairy desert scorpion.

Figure 17. Solpugid or sun spider.

Figure 18. Daddy-long-legs.

Medical personnel interested in more information on the treatment of spider bites are referred to: Wasserman, G. S. and P. C. Anderson. 1984. Loxoscelism and necrotic arachnidism. Journal of Toxicology. Clinical Toxicology. (1983-1984). 21: 451 - 472.

Spider Relatives

Sun Spiders/Wind Scorpions/Solpugids

Sun spiders are bizarre looking arachnids (Order: Solifugae) most common to southeastern Colorado. Occasionally they are found along the Front Range. They possess large conspicuous jaws used to crush prey, but they do not have venom glands. Also present are prominent enlargements of the mouthparts (palps) that give the impression of a fifth pair of legs. Sun spiders are active animals, and a common name 'wind scorpion' reflects this behavior. They occasionally enter buildings, particularly in early summer. Sun spiders are discussed in more detail in fact sheet 5.589, *Sunspiders (Windscorpions)*.

Scorpions

Scorpions are arachnids that have an elongated abdomen tipped by a stinger. A portion of their mouthparts (pedipalps) are modified as pincers. Scorpions found in Colorado capture and kill their prey primarily using these large pincers. Only when necessary do they bend the stinger over their body and inject poison into the prey. Species found in Colorado are not dangerous to humans although the sting can be painful.

Daddy-long-legs (Harvestmen, Phalangids)

Daddy-long-legs are not true spiders, but are arachnids placed in another order (Opiliones). You commonly encounter them outdoors, particularly when adults are present in late summer and early fall. Because they are active around harvest time, one of their common names is 'harvestmen'. Daddy-long-legs are characterized by extremely long legs and a body that is not distinctly separated into regions. Unlike spiders, daddy-long-legs do not possess poison glands nor do they produce silk. A common, worldwide 'urban legend' about daddy-long-legs is that they are "the most poisonous spider, except their fangs are too small to pierce human skin." This is completely without foundation.

Spider Bites

Most spiders are not aggressive and bite only when trapped against the skin. If a bite is suspected or is known to have occurred, follow these first aid steps recommended by the American Red Cross:

1. Treat the site of the bite with an antiseptic to prevent infection.
2. Apply ice to the site of the bite to reduce pain and swelling.
3. If a black widow or brown recluse spider is suspected, or if serious symptoms develop such as increasing pain or swelling, consult a physician.

If at all possible, bring the spider to the physician's office. Effective antivenins are available for black widows, but they can only be used if the spider that inflicted the bite is positively identified.

It should be stressed that spider bites are difficult to diagnose correctly as there are many other medical conditions that mimic the same symptoms. Spider bites, particularly those of "brown recluse spiders," are greatly overdiagnosed in Colorado.

Controlling Spiders Around the Home

From a biological standpoint, it is rarely necessary to control spiders. However, if it is desirable to get rid of spiders in the home, a combination of sanitation and pesticides should be effective. Pesticides alone, without some effort to remove or modify favorable spider habitats, will not be effective.

Remove rocks, wood piles, compost piles, old boards, and other

sheltering sites adjacent to the home. Eliminate migration of spiders into homes by caulking cracks and crevices around the foundation. Make sure all screens and doors are sealed tight. Keep crawl spaces free of debris and limit boxes and other potential hiding places from basements and other dark storage areas. Regularly vacuum or brush spider webs. The elimination of other insects that are prey can limit spider development.

Occasional spiders can be removed by hand (wear gloves or grasp the spider with a tissue) or with a vacuum. Sticky traps, used to control cockroaches and rodents, can capture spiders when placed along baseboards or other migration areas.

Residual insecticides can be used to control spiders when applied to corners and other sites where spiders tend to breed. Household insecticide products containing various pyrethroids (bifenthrin, cyfluthrin, permethrin, tetramethrin) are commonly available for this purpose and should be applied in accordance with the label's instructions. Total release foggers, containing pyrethrins, probably will have little effect on spiders.

Where spiders and webbing occur in nuisance numbers on the outside of buildings they can be washed off with a forceful jet of water. Reduction of outdoor lighting, or replacing lighting with yellow or sodium vapor lights that are not attractive to insects, can limit spider web building. Dark colored siding seems to be less attractive than white siding to the insects on which spiders feed.

Further Reading:

Foelix, R. 1993. Biology of Spiders. Harvard University Press, Cambridge, MA.

Gertsch, W.J. 1979. American Spiders. Van Nostrand Reinhold Co., New York.

Kaston, B.J. 1978. How to Know the Spiders. Wm. C. Brown Co., Dubuque, IA.

Levi, H.W. 1996. A Guide to Spiders and Their Kin. Golden Press, New York.

[1]*Colorado State University Extension entomologists and professors, bioagricultural sciences and pest management; P. Cushing, curator of entomology and arachnology, Denver Museum of Nature and Science.*
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