Are you itching at the ankles soon after hiking, picnicking, or walking on a lawn? You may have chigger bites. The chiggers found in Maryland, also known as red bugs, are the immature form of a mite. The bites can cause small, red bumps on the skin and intense itching. Chiggers occur most frequently in areas of thick vegetation where the animals they normally bite (small mammals, birds, and reptiles) live. Although chiggers are more common in damp shady areas, they also occur on golf courses or lawns. Peak chigger activity is from late spring through early fall, just when people are most likely to be outdoors.

**Life Cycle**

Chigger mites have four life stages: egg, larva, nymph, and adult. Only the tiny (1/120 - 1/150 inch) larval chiggers bite humans and other vertebrates. After feeding for up to 3 days, a larva drops off and transforms into the nymphal stage. Both the nymph and adult stages of the mite are predators of small arthropods and arthropod eggs.

**Chigger Bites and Treatment**

Contrary to popular belief, chiggers do not burrow into the skin or suck blood. When the larval mites find a host (such as snakes, toads, squirrels, mice, or humans) they search for a suitable feeding site, usually a skin pore or hair follicle. Then the mite secretes a digestive enzyme which breaks down the skin cells and causes the surrounding skin tissue to form a hardened, raised area that functions as a feeding tube. This tube allows the mite to gain access to the digested skin cells.

Chiggers can be removed by a soapy shower; the sooner they are removed, the less intense and long-lasting the reaction will be. Bites typically occur where clothing is tight or skin is wrinkled, usually around the ankles, wrists, thighs, groin and waist. The body’s reactions to the mite’s digestive enzyme creates the initial itch starting three to six hours after initiation of the bite. The agonizing itching can last longer than one week, especially without treatment at the onset of itching. Secondary infections caused by scratching bites can increase both size and duration of the skin irritation.

Chiggers can be prevented by wearing long tightly woven pants with cuffs tucked into socks. Closed-toed shoes and a long-sleeved shirt are also recommended. Try not to brush against vegetation or sit in grassy areas or leaf-litter. Stay in the center of trails.

Immediately after returning from chigger habitats, take a hot, soapy shower to wash off any chiggers. If you cannot bathe immediately, rub down with a towel to dislodge chiggers. Chiggers often spend several hours wandering on the host before settling down to feed.

Wash clothing and picnic blankets immediately in hot soapy water (at least 125°F) after being exposed to chigger habitat. Chiggers can survive laundering in cool water.

**Chemical Treatments**

Insect repellents containing DEET (N, N-diethyl-m-toluamide) are effective for 2-3 hours. Apply repellents to pant legs and cuffs, socks, and shoes. DEET should never be applied to skin covered
by clothing or gloves. Follow the label directions closely, and
use with caution on children.

Another option for chemical prevention is the use of permethrin (0.5%) only on clothing, never directly on skin. For best results
apply to clothing the day before use. Make sure garments are
completely dry before wearing. This pesticide can give days of
effective protection against chiggers.

Treated Infested Habitats

The easiest and most effective long term solution to chigger
infestations is vegetation management. Keep lawns cut low
and vegetation pruned to allow air circulation. These steps
will decrease the amount of moisture in the area, drying out the
vegetation and making it inhospitable to chiggers. Landscape
management techniques that discourage other hosts (such as
rodents) will also help lower chigger populations. It is best to
continue these practices each year because chigger adults spend
the winter under the soil and may reinfect a yard in the early
spring when adult females lay eggs.

Pesticides are not effective or recommended to control chiggers
outdoors. The infestations occur in dense, little patches depending
on where eggs were laid. Even if treated, chigger populations
will rebound quickly.

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USE INSECTICIDES WITH CARE.
READ THE LABEL DIRECTIONS.
FOLLOW ALL SAFETY PRECAUTIONS.

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