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#75



The

European

Earwig

How To Control It
Around the Home

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The European earwig¹ is most common in the New England, Middle Atlantic and Northwestern States where there is abundant rainfall or irrigation to provide moisture and food.

This insect is a nuisance in and about the home and in gardens. It is much disliked because of its repulsive appearance, foul odor, and habit of feeding at times in kitchen refuse or hiding in a wet mop. It is also destructive to many plants and flowers.

¹ *Forficula auricularia*.

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APPEARANCE

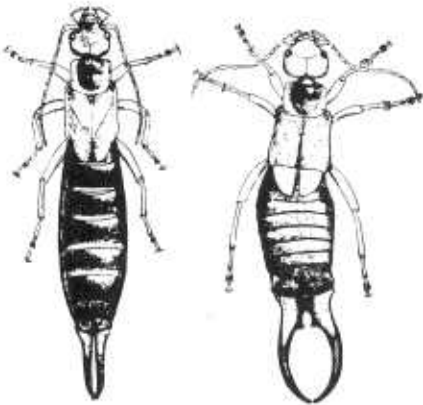
An adult European earwig is reddish brown and about three-fourths inch long. Like other insects it has six legs on the forepart of the body. But unlike most insects it has a pair of strong forceps on the rear part. The female has straight forceps, the male curved ones. The earwig's antennae are slender and very flexible.

A young earwig resembles an adult female, but is smaller and lighter in color. Its forceps are weak and slightly curved.

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TC 7208

The European earwig: Left, adult female; right, adult male. (Three times natural size.)

HOW IT LIVES

The female lays eggs in a nest in the soil. Both the female and the male live in the nest until the eggs hatch. The female takes care of the young until after they leave the nest in the spring and are able to take care of themselves. The number of young in a brood averages about 30.

Earwigs hide during the day, and roam and eat at night. Around homes they hide in garden plants, in shrubbery, along fences, in woodpiles, at the base of trees, and behind loose boards on buildings.

They feed on plants, ripe fruit, and garbage. The plants that they feed on—and damage—include dahlias, zinnias, butterfly bush, hollyhock, lettuce, strawberry, celery, potatoes, and seedling beans and beets. They damage sweetcorn by feeding on the silks.

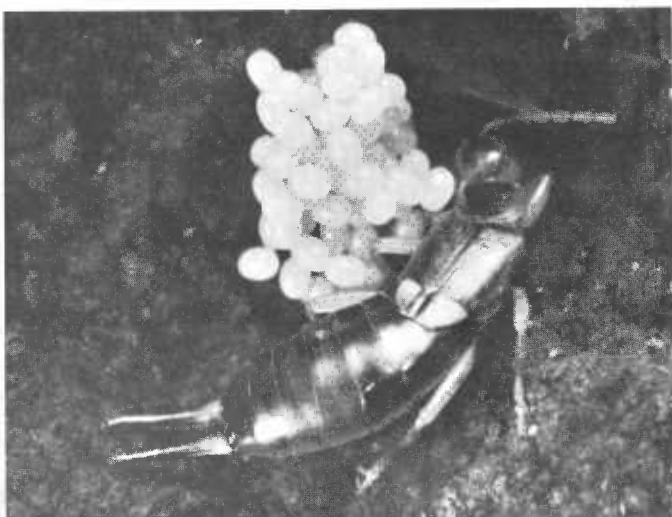
The European earwig is chiefly an “outdoors insect.” But individuals often crawl into houses or are brought in along with flowers, vegetables, and fruit. Their habit is to hide among petals or leaves, or inside fruit. Later, as flowers are being arranged or food is being prepared, they run out—or they may crawl out unnoticed, hide again, and come out at night for food and water.

SPREAD

The European earwig got into the northwestern part of the United States early in the 1900's,

Female European earwig with eggs.

TC 1310



apparently in cargo from Europe. It spread rapidly throughout the Western States. A few years later it came to the east coast, probably also in cargo. Its spread in the East is not so extensive.

The insect is spread largely by man—in bundles of plants and shrubbery, in cut flowers, and in florists' equipment. Spread by natural means is limited by the fact that earwigs seldom fly and cannot stay in flight very long. To fly they must take off from some high place, such as a pole, a tree, or the top of a building, because their wings are not strong enough to lift them from the ground.

CONTROL

Bait

Except in some dry areas, poison bait is the most convenient and effective means of killing earwigs near the house and in the yard but is not approved for use in the vegetable garden. Bait may be prepared at home. In some localities it may be obtained from garden-supply stores.

PREPARING BAIT.—A bait that you can prepare at home contains—

Bran.....	12 pounds
Sodium fluosilicate.....	1 pound
Crude or refined fish oil.....	1 quart

Ears of corn with grains undeveloped because of feeding of the European earwig on the silks.

TC 1272



Mix the dry bran thoroughly with the poison. Add fish oil (crude is best), and mix thoroughly again. This amount will cover about 11,000 square feet. It is enough to treat the infested area of the average city lot twice.

APPLYING BAIT.—For best control, apply bait within 2 or 3 weeks after the young earwigs come out of the soil in the spring.

Broadcast the bait thinly over the entire area in which earwigs may be found except where plants are grown for food or feed. Throw each handful with a strong sweeping motion to scatter the flakes of bran. Be sure that some falls on or near earwig hiding places, such as wood-piles and loose boards. Earwigs will find the scattered particles of bait as they roam at night. Give them more than one night in which to find the bait; it is best to let at least three nights pass before washing the bait away or watering lawns on which bait has been broadcast.

After bait is applied, shake plants and small shrubs to dislodge any bait that may be on the leaves or in pockets around the stems. The bait injures some tender plants if it is left on them.

If bait is to be applied where poultry or game birds range, put small quantities of it in covered cardboard boxes. Punch a few holes in each box to allow the earwigs to enter. The holes should be the size of a lead pencil and near the ground.

TC 1274-B



Zinnia plants
damaged by
earwig
feeding.

Dusts and Sprays

In dry areas, where bait may not be effective, dusting or spraying the infested places with DDT or chlordane will control earwigs.

Buy DDT or chlordane in the form of a 5-percent dust or a 50-percent wettable powder. The dust is ready to apply when purchased. Wettable powder is for preparing spray.

To prepare a spray, mix 2 level tablespoons of DDT wettable powder or 1½ level tablespoons of chlordane wettable powder with 1 gallon of water.

Six ounces of dust or 1 gallon of spray is sufficient to treat 500 square feet.

Apply dust or spray soon after young earwigs come out of the soil in the spring; apply again in midsummer if earwigs are troublesome. Treat the entire infested area except as indicated under "Specific Precautions" (paragraphs 2 to 4).

Dust or spray may be cautiously used to control earwigs in the house, but thorough treatment of infested areas outdoors usually makes treatment inside unnecessary.

Natural Enemies

Several species of parasitic flies are natural enemies of the earwig in Europe. None of these was here at the beginning of earwig infestation in this country, and the earwig increased rapidly. Since then, two species of the parasites have been brought from Europe and distributed in some of the infested areas.

The parasites are susceptible to most insecticides. Therefore, to get full benefit from the parasites, it is best not to apply insecticide for earwig control during the early summer when the adult parasites are active.

PRECAUTIONS

GENERAL

Insecticides improperly used may cause injury to man and animals. Use them only when needed and handle them with care. Follow the directions and heed all precautions on the labels.

Keep insecticides in closed, well-labeled containers in a dry place. Store them where they will not contaminate food or feed, and where children and animals cannot reach them.

When handling an insecticide, wear clean, dry clothing.

Avoid repeated or prolonged contact of insecticide with your skin.

Wear protective clothing and equipment if specified on the container label. Avoid prolonged inhalation of insecticide dusts or mists.

Avoid spilling insecticide concentrate on your skin, and keep it out of your eyes, nose, and mouth. If you spill any on your skin, wash it off immediately with soap and water. If you spill it on your clothing, launder the clothing before wearing it again.

After handling an insecticide, do not eat, drink, or smoke until you have washed your hands and face. Wash your hands and face and any other exposed skin immediately after applying insecticide.

To protect water resources, fish, and wildlife, do not contaminate lakes, streams, or ponds with insecticide. Do not clean spraying equipment or dump excess spray material near such water.

To protect honey bees and other pollinating insects apply insecticide, when possible, during hours when the insects are not visiting the plants.

Avoid drift of insecticide to nearby wildlife habitats, bee yards, crops, or livestock.

Dispose of empty insecticide containers at a sanitary land-fill dump, or bury them at least 18 inches deep in a level, isolated place where they will not contaminate water supplies. If you have trash-collection service, wrap small containers in heavy layers of newspapers and place them in the trash can.

SPECIFIC

1. If chlordane is used indoors, apply it only to places where earwigs hide or crawl. Apply it directly to surfaces, not into the air. Do not apply it to surfaces with which persons frequently come in contact.

2. Do not apply chlordane or the poison bait to fruit or vegetables that are to be eaten, or to foilage that is to be used for food or feed.

3. Do not apply chlordane or DDT to grass or other plants that milk animals may eat while grazing; and do not apply it to foilage that may be fed to milk animals or to meat animals being finished for slaughter.

4. Do not apply DDT to cucumber, eggplant, melons, pepper, pumpkin, squash, or tomato within 5 days before harvest; or to beans or okra within 7 days before harvest or to berries while fruit is on the plants. Do not apply DDT to celery after the bunch begins to form or the stalk is half grown, whichever is earlier. Do not apply DDT to other crops past the seedling stage or after the appearance of parts that are to be eaten unless the residues can and will be removed by stripping.



Washington, D.C.

Use Pesticides Safely
FOLLOW THE LABEL

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U.S. DEPARTMENT OF AGRICULTURE

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