



Clothes Moths and Plaster Bagworms¹

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Clothes Moths

Clothes moths are major pests of fabric and other items made of natural fibers. Clothes moth larvae commonly feed on wool, feathers, fur, hair, upholstered furniture, animal and fish meals, milk powders, and most animal products, such as bristles, dried hair, and leather. Larvae will also infest or feed on lint, dust, paper, and materials soiled with oil. Clothes moths can feed on mixtures of natural and synthetic fabrics. However, they cannot feed on materials made of synthetic fibers. In nature, clothes moths have been found infesting pollen, hair, dead insects, and dried animal remains.

The most common clothes moths are the webbing clothes moth and the case-making clothes moth. Adult moths do not feed on fabrics, only the caterpillars damage fabrics. Fabrics injured by clothes moths have holes eaten through them by the tiny white caterpillars. Damaged fabrics often have silken cases or silken threads on the surface. Adult moths may be found running over the surface of infested garments or materials. Unlike many other moths, clothes moths are not attracted to light and avoid lighted areas.

Description

Clothes moths (Figure 1) are small yellowish or brownish moths from 1/4" to 1/2" in length, depending on species. The head and front wings of the webbing clothes moth are golden or yellowish in color; the wings do not have spots. The case-making clothes moth has a dusty, brownish head and front wings with three dark spots, which may be rubbed off with wear.

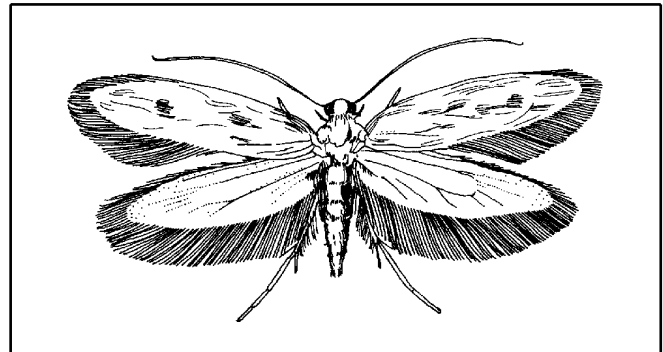


Figure 1. Case-making clothes moth adult.

The larvae spin a silken tube or case to protect them from the environment and natural enemies. The tubes created by the webbing clothes moth are attached to and are often located in dark protected

1. This document is ENY-223, one of a series of the Entomology and Nematology Department, Florida Cooperative Extension Service, Institute of Food and Agricultural Sciences, University of Florida. Publication date: January 1994. Revised: February 2003. Please visit the EDIS Website at <http://edis.ifas.ufl.edu>.

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areas such as seams or hems. Therefore, the larvae of the webbing clothes moth are stationary and feed in one area. The case made by the case-making clothes moth is not attached to the fabric. The larvae drag the case along and are relatively mobile.

Life Cycle

The life cycle of the clothes moth can last from two months to 2 yrs. The adults lay eggs on products that the larvae will consume. Each female moth can lay from 100 to 150 eggs, which hatch in about five days. The small white caterpillars vary in size from 1/16 inch newly hatched to 1/3 inch fully grown. The larval stage varies greatly according to conditions and food supply. The larvae live in cases that are enlarged as they grow. When the larvae pupate, the case is transformed into a tough cocoon. The adult moth emerges in one to four weeks.

Control

Prevention and Inspection

The most important method of clothes moth control is good housekeeping. All susceptible articles should be brushed and cleaned periodically, especially items that will be stored for any length of time. Dry clean items such as woolen sweaters, before they are stored. Sweep or vacuum regularly to remove woolen lint or hair from floors, shelves, and drawers. Also inspect areas for the presence of clothes moths, such as attics, ventilation ducts, and other areas where insects and dust accumulate. Clothing bags, cedar closets, and cedar chests only provide protection when stored materials are free from infestation.

Chemical Control

Some woolen fabrics and carpets can be mothproofed by the manufacturer; however, very few of susceptible products are mothproofed today. Crack and crevice or spot treatment with insecticides may be necessary when clothes moths become established in the home (Table 1). Apply sprays according to label directions and do not apply directly to clothing. Sprays are effective when properly applied to surfaces as spot treatments. Sprays should be directed to all known or suspected breeding places. Clothing

should be removed from closets and drawers before spraying interior surfaces. For severe infestations it may be necessary for a Pest Control Company to fumigate the structure. Fumigants labeled for clothes moth control are listed in Table 2. Tight closets, trunks, or chests can be mothproofed by application of moth balls at the rate of 1 pound per 50 cubic feet of space (Table 3).

Plaster Bagworms

Plaster bagworms (Figure 2) are similar in appearance and closely related to clothes moths. The larvae of bagworms live in a flattened, gray, watermelon seed-shaped case about 1/2" inch long. The case is constructed of silken fiber and sand particles, lint, paint fragments, and other debris. The case has a slit-like opening at each end, and the larva is able to move around and feed from either end.



Figure 2. Plaster bagworm pupal case. Credits: James Castner, University of Florida

Plaster bagworms are easily seen on light-colored walls. Close examination of the house may reveal bagworms attached to the underside of chairs, bookcases, and other furniture. They are often found along the edge of rugs, near baseboards, or on the lower edges of walls. Bagworms are quite common in garages and underneath buildings. The larvae mainly feed on spider webs; however, they will also feed on fabrics made of natural fiber.

Control of plaster bagworms is similar to control of clothes moths. Good housekeeping is important, especially the removal of spider webs. Sweep down and remove any spider webs and bagworm cases.

Table 1. Clothes moths management products labeled for crack and crevice or indoor surface treatment.*

Common Name	Homeowner Products*	Commercial Products*
Cyfluthrin	Bayer Advanced Home, Home Pest Control Indoor & Outdoor Insect Killer	Tempo 20 WP Tempo SC Ultra
Deltamethrin		DeltaDust
Pyrethrins		Kicker PT ULD BP-300
Pyrethrins, PBO		PT P.I. Contact Insecticide PT ULD BP-50
Pyrethrins, PCO		Pyrenone 50
Tralomethrin		Saga WP Insecticide
* Read label carefully to insure pest, site, and commodity are listed prior to applying product. Some product labels are very restrictive.		

Table 2. Clothes moths management products labeled for fumigation treatment.*

Common Name	Homeowner Products*	Commercial Products*
Sulfuryl Fluoride		Vikane
* Read label carefully to insure pest, site, and commodity are listed prior to applying product. Some product labels are very restrictive.		

Table 3. Moth balls labeled for clothes moths management.*

Common Name	Homeowner Products*
Napthalene 99.83%	Enoz
Napthalene 99.9%	Enoz
Paraoichlorobenzene 99.6%	Enoz
* Read label carefully to insure pest, site, and commodity are listed prior to applying product. Some product labels are very restrictive.	