

WORK STUDY > OPPORTUNITIES FOR PROFIT

# WASP



DELIVERING HIGH QUALITY TRAINING

  
Killgerm®  
TRAINING

## PROBLEMS

Wasps can be regarded as generally useful insects, helping to control other pests and cleaning up dead insect carcasses. They can even act as pollinators, but in general they are regarded as nuisance pests and a threat to health. Many people have a genuine phobia against them, in some cases, with good reason.

Wasp stings may be unpleasant to most of us, but to some they can prove fatal. The ability of these social insects to inflict multiple stings means that for certain individuals, they can kill. Insects are no respecters of rank, the first recorded instance of a fatal wasp sting was the death of King Menes of Egypt in about 3000 BC.

## STINGS

*“A plaster made of wilde malowe leaves is good to drawe out the styng. And salt and vinegar tempered with hony is very good. Oyle of bay is good also for the styng.”*

**J. de Cuba in his Hortus Sanitatis in 1491**

A poultice of leaves perhaps. An application of vinegar, though still used today, will more than likely irritate the sting further as wasp venom is not alkaline. The best treatment for non-allergic people is to wash the site of the sting with soap and water and apply an anti-histamine preparation.

Insect venoms are complex mixtures and they can produce allergic reactions of two types: respiratory obstruction or a condition known as anaphylactic shock syndrome. This causes vascular collapse – breathing becomes shallow, the pulse is almost undetectable, there is profuse sweating and the victim quickly loses consciousness. Death from wasp stings is rapid, when compared to death from snake venom; 66% of susceptible victims die within one hour of being stung.



Although eleven species of true wasp are found in Europe, only two, the common wasp (*Vespula vulgaris*) and the German wasp (*Vespula germanica*), are important as pest species and increasingly examples of the genus *Dolichovespula* are being encountered. All overwinter as queens, the common wasp usually hibernating in buildings or underground, the German wasp typically in tree cavities and *Dolichovespula* is normally found well away from buildings.

The young queen emerges in the spring, feeding on nectar and sap and begins to construct her new nest from wasp paper, a mixture she concocts from chewed wood, plant debris and saliva. Favourite places for nests are in the ground, hollow trees, eaves, attics or garden sheds.

Her first batch of eggs is produced within a few days and the larvae develop within the nest. The mature larvae construct silken cocoons in which they pupate, still within the cells of the nest. Four to six weeks later, the first generation of workers emerge. They are smaller than the queen and all female – male wasps emerge later in the season.

The workers then take over the ongoing nest construction, enveloping the whole nest in wasp paper, which could by now extend to eight tiers. They also forage for food, ventilate the nest (by vibrating their wings) and nurture and feed the developing wasp larvae.

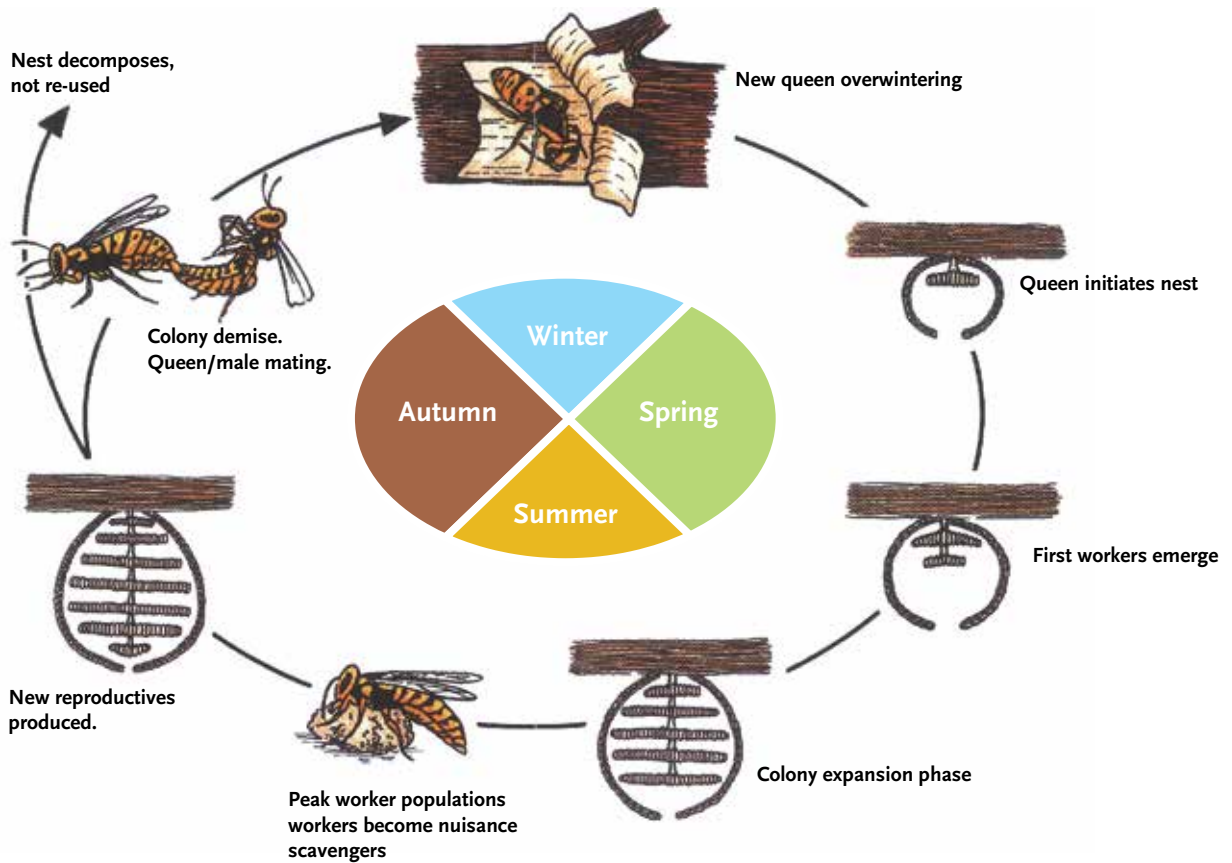
The queen now spends all her time egg laying, each cell being used numerous times to rear larvae. By the end of the summer, a nest may house over 20,000 wasps.

With the onset of autumn, new males emerge to fertilise new queens who go on to search for hibernation sites. During the winter months the old queen and workers die and the nest will not be reused.

**The surest way to treat wasps is by destroying the nest. Finding the nest can be a problem in itself although the client may well know its location**



LIFE CYCLE



CONTROL

Despite a high mortality rate, the need to control wasps is more and more obvious, especially as the number of infestations appears to be increasing. Requests for control come from two sectors, domestic and commercial and of course, the most pressing time is in the summer months when nests are at their largest. Historically, there have been nine principal ways to apply this control:

- Killing overwintering queens
- Nest destruction
- Insecticidal baiting
- Trapping
- Electric fly killers
- Contact insecticides
- Preventative measures
- Biological control
- Integrated wasp control

The surest way to treat wasps is by destroying the nest. Finding the nest can be a problem in itself although the client may well know its location. If not, a food source can be left as bait for foraging wasps who can then be followed back to the nests, if the nest is close to the food source.

TREATMENT

Ideally, nests should be treated early or late in the day when wasp activity is at a minimum and the nest is likely to contain a high population of workers. The application of an insecticidal dust in and around the entrance of the nest with a dust applicator is effective treatment and returning workers will carry dust further into the nest. They are convenient, ready-to-use insecticides that are white and odourless, ideal for use where people work and live or where food is stored or processed.

Alternatively, a labeled water dispersible powder or liquid insecticide can be applied with a pneumatic sprayer fitted with a pinstream nozzle. Their residual activities can extend to many weeks in dry conditions and the product will not taint even the most sensitive foodstuffs.

When applying liquid insecticides, the nest entrance should be soaked first, along with the area immediately around it followed by application into the nest. Appropriate personal protection equipment should be worn and people kept away during the insecticidal application.

For convenience a wasp nest destroyer aerosol is available allowing one-handed operation and using a far reaching accurate jet. This method is ideal when treating nests in restricted areas such as roof spaces or when the use of ladders is necessary.



PA2 Powder Application



XL8 Extension



Wasp Wand



AR8



DR5 Duster



Dustick



B&G Bulb Duster



Wasp Bags



All-in-one Heavy Duty Beekeepers Suit



Super Deluxe Beekeepers Jacket



Ficam D  
Contains 1% bendiocarb



Wasp Trap



Killgerm Wasp Nest Destroyer

Contains: 0.27% Permethrin,  
0.11% Tetramethrin



Fly & Wasp Bait



Digrain Wasp  
Contains: 0.275% Permethrin,  
0.24% Tetramethrin

DELIVERING HIGH QUALITY TRAINING