

Life History of *Vespa velutina*

Estimations for Temperate Climate

Colony Collapse

Reproductive males die shortly after mating, followed by the old queen and workers when temperature decreases over winter. Only foundresses hibernate through the winter.

Reproduction

Nests sizes peak in September/ October. A large nest can have upwards of 6,000 hornets and produce between 200 to 500 future queens, and as many males. Male and females mate, then foundresses (fertilised females) leave in search of suitable places to hibernate.

Hibernation

Queens overwinter in dry, sheltered spaces e.g. under tree bark. Approximately 99% of queens do not survive hibernation. However, only one queen is needed to establish a population.

Nest Building

Queens build papery 'primary nests' and lay eggs in combs. Up to a month later, adult workers emerge and take charge of building and maintaining the nest and feeding the brood. Colonies will relocate if the location is unsuitable.



Nutrition

Adults get sugary liquids from honeydew, nectar, honey, etc., and protein from insects including wasps, flies, spiders, and bees.