

Crazee Mite (*Anystis baccharum*) Predatory (Whirligig) Mite

Target Pests

Two-spotted spider mite (*Tetranychus urticae*)
Aphids
Thrips
Whitefly
European Red Mite (*Panonychus ulmi*)

Description

Crazee Mites are specialized mites in the *Anystidae* family.

- Crazee mites are relatively large, especially as adults. They are red and roughly twice the size as an adult persimilis.
 - Several hairs are noticeable on their legs and abdomen.
- Adults and nymphs are highly mobile and will readily cross non-organic surfaces.

Use in Biological Control

- Research is ongoing
- Research in Canada (Vineland Research and Innovation Centre) has shown that thrips control by *Anystis baccharum* is greater than other bio-control agents, but greatest when combined with *Neoseiulus cucumeris*.
- Crazee mites can cycle on aphids as their only food source and are known to control most species of aphids.
- Anystis has a long history in conservational bio-control against a variety of agricultural pests including the European Red Mite.
- Optimum conditions are temperatures of 24°C and humidity over 70%RH. While egg viability is dependant on moisture, adults and nymphs remain active and fit within a large range of temperature and humidity.
- Applicable for all indoor and outdoor crops and applications.

Monitoring Tips

- Watch for Crazee Mites running in their erratic behaviour on exposed surfaces.
- They often stop to feed and usually under leaves and in protected areas.
- Nymphs are paler in colour, smaller and slower, but much more difficult to see.
- To date, the most consistent monitoring strategy has been to measure the reduction of pests.

Life Cycle

- Crazee mites have one larval and three nymph stages before reaching adulthood.
- There is pupation separating each stage and can last just over one week.
- Egg to egg-laying adult is approximately 4 weeks
- All mites are female.
- Adults live, feed and continually lay eggs for up to three weeks.

Product Information

- **Crazee Mite 1,000.** One thousand adults on wood shavings in plastic pouch. There is an allowance of 10% mortality. Upon receipt, gently acclimatize the container to release

environment. Apply contents to a central location but avoid piling the entire contents to minimize cannibalism.

- **Craze Mite 250.** 250 adults on wood shavings in plastic tub. Details as above.
- **Craze Mite 250 Eggs.** Hundreds of eggs to produce at least 250 mobiles. Gently acclimatize to release environment. Open lid and place in a central location. Scout for nymphs emerging from container and move container from place to place to spread out release points.

Introduction Rates

General Introduction Rate

- Most growers agree that 0.25 mites per square foot is a sufficient preventative rate. Although there is still a wide range of introductory rates based on crop, pest and environment.

Knock-down

- Knock-down rates are a factor of time. 2 mites per square foot is enough to immediately impact some pest populations, but greater rates will result in quicker knock-down.

For Best Results

- Aphid control is best achieved with preventative applications of Craze Mites as needed, and regular preventative releases of Aphidoletes every three weeks during peak aphid season.
- Spider mite control is best with Neoseiulus fallacis introduced preventatively at a rate of 2 mites per square foot, followed by a Craze Mite Application of 0.25 mites per square foot.
- Thrips Control is best achieved with an introductory rate of Craze Mites (0.25 mites per square foot) and reapplied as needed, with regular releases of Neoseiulus cucumeris every 4-5 weeks or as needed.

Using Pesticides

- There is no current list of pesticide compatibility or resistance for *Anystis baccharum*.
- Historical data notes the presence of *Anystis baccharum* in orchards after chemical applications.
- However, all beneficial insects and mites perform best with no chemical interference.