www.bioforce.net.nz/products/Mite-A.html

Mite-A™ for Thrips Control

Amblyseius cucumeris – Predatory mite


An *A. cucumeris* mite

Supplied in bulk form or in slow release sachets (please contact us directly for a quote on sachets, large orders only)

Mite-A™ is a highly active predator of thrips, especially onion thrips, *Thrips tabaci,* Western flower trips, *Frankliniella occidentalis,* New Zealand flower thrips, *Thrips obscuratus* and other thrips species. **Mite-A™**will also eat twospotted spider mite and other mite species.

Mite-A™ is known to be useful on greenhouse crops such as tomato, cucumber, pepper and ornamental plants as part of an integrated pest management programme.

BE PROACTIVE - **Mite-A™** is best used in a preventative manner, applied early to the crop prior to the build-up of thrips. **Mite-A™** can survive and breed in the presence of pollen alone.

The Pest – Thrips

Thrips are small slender insects and adults about 1-1.5 mm long, with feathery wings. Their colour varies from pale yellow to light or dark brown. The immature stages (nymphs) look similar to adults but are smaller, paler in colour and lack wings.

Thrips have piercing-sucking mouth parts and feed by puncturing the surface of leaves, flowers and fruit. Both adults and nymphs cause damage.

Signs and symptoms of thrips include:

- Yellow speckled or silvered appearance of leaves and fruit
- Black spots of excrement on leaves
- Small insects in the flowers or on the undersides of young leaves in your crop

Thrips may also be responsible for the transmission of some virus diseases.

The Solution – Mite-A™

Mite-A™ is a small, highly active predatory mite and is pale in colour. Adult females are approximately 1.25 mm long.

Mite-A™ feeds on the first larval stage of thrips only, consuming 1-5 thrips per day depending on temperature and humidity. This reduces the number of thrips in the crop slowly, and so an immediate reduction in adult numbers may not be apparent.

Mite-A™ also feeds on other mites, such as mould mites, and on the eggs and early stages of twospotted spider mite.

Mite-A™ can use pollen as a food source which helps it survive under low prey conditions. Capsicums and other crops provide a ready pollen source, but if pollen is too plentiful, this can reduce the effectiveness this predator.

Mite-A™ is not considered harmful to humans and animals, and no environmental impacts are expected.

Environmental conditions

Optimum conditions for **Mite-A™**are warm (20-25 ℃), semi-shaded conditions with relative humidity greater than 65%. Plants planted close together or with dense foliage provide these conditions.

Packaging

Mite-A™ is supplied in either sachets or as a bulk mixture.

Sachets contain approximately 40 ml or 5 g of bran mixture with a minimum of 400 predatory mites per sachet, and mould mites which act as a source of food for the predators.

Neither **Mite-A™** nor the mould mites damage living plants.

Release Rates

BEST USED FOR THE PREVENTION OF THRIPS

- **Broadcast application**
- **Outdoor crops**
- Minimum of 25 ml mite mixture per m^2 sprinkled carefully on the leaves of the crop.
- **Greenhouse/Indoor crops**
- Application of 1 litre mite mix per 50-100 m^2, sprinkled carefully on the leaves of the crop.
- A repeat application 2 weeks later is recommended to ensure establishment
- High value or thrips susceptible crops benefit from weekly or fortnightly applications
- Can provide some protection from two spotted mites (TSM) when TSM densities are low

- **Sachet application**
- **Greenhouse/Indoor crops**
- 500 sachets per 1000 square metres, or approximately 1 sachet per 4-5 plant stems.
- **Mite-A™** will emerge from the sachets over a period of 2-4 weeks. In capsicum, introductions of predators should be made every 6 weeks throughout the winter. In summer, one introduction should be sufficient at the time of first flower opening.

Release and Storage Instructions

Mite-A™ is dispatched via courier and should reach you within 1 to 2 days.

Once received:

- Do not expose to direct sunlight
- Keep in darkness and in a cool environment – ideal temperature 10-15 ° C.
- DO NOT REFRIGERATE
- Apply to the crop as soon as possible, ideally within 1-2 days

Post Release

Mite-A™ disperse rapidly on release and aggregate on high-density patches of thrips larvae.

An immediate effect on thrips populations is usually not observed, as feeding by the predator is mostly restricted to early immature stages of thrips.

Thrips populations should be closely monitored to determine whether additional **Mite-A™** need to be released, or a selective chemical application is needed to reduce adult thrips number.

Before introducing Mite-A™ into your crop please check residual chemical affects and ensure you know chemical compatibilities of products that may be applied.

A list of compatible pesticides and withholding periods can be found in the publication 'The Good Bug Book' Second Edition (2002), Editor Richard Llewellyn. Excerpts of the book can be obtained from the Cucumeris page of the Australasian Biological Control Association website.

Price

PRICE: $10.00 per litre (10,000 mites per litre, minimum order) plus GST and Freight