



Oleander Hawk moth (*Daphnis nerii*) A notorious pest on Nerium

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Introduction

Nerium oleander is most commonly known as Olenader (or) Nerium and it belongs to the family Apocynaceae. In Tamil, it is called as “Arali”. It is a shrub (or) small tree, which is cultivated worldwide in both temperate and tropical areas as an ornamental and landscaping plant.

Oleander hawk moth (*Daphnis nerii*) is the most common and notorious pest of nerium. The other name for this moth is “Army green moth”, belongs to the family Sphingidae and comes under the order called “Lepidoptera”.

Distribution

Daphnis nerii is a large hawk moth found in wide areas of Africa, Asia and Hawaii. It is a migratory species, flying to parts of

Eastern and Southern Europe during summer.

Feeding habits

Mostly adults feed on nectar of variety of flowers. They preferred fragrant species like petunia and jasmine. Especially, they are active during the twilight time and

hovering over the flowers after sunset. The caterpillars feed mainly on nerium leaves, a highly toxic plant, to which the caterpillars are immune.

Nature and symptoms of damage

Sphingid larva feed gregariously on nerium

leaves and defoliate them completely.



Larva feeds on leaves



Complete defoliation of leaves

Pest identification

Egg

- Laid singly on bottom surface of the leaves and as well as on the flowers also
- Eggs are greenish and globular



Eggs laid on the bottom of Nerium flower



Closer view of Sphingid egg



Egg after hatching

Larva

- Newly hatched Sphingid larva are 3-4 millimeter in length, bright yellow and have a black elongated horn in the anal region
- As they get aged, the larvae become green to brownish colour with a large blue and white eyespot near the head and a yellow horn on the rear (last abdominal segment) called “anal horn”
- A matured or late instar larva is around 7.5 to 8.5 cm in length



Newly hatched larva with black elongated anal horn



Matured larva with blue eyespot and yellow anal horn

Pupa

- Before pupation, the hawk moth larvae becomes brown in colour and it measures around 5.5 to 7.5 cm which having black spots
- The pupa is pale red or brownish white in colour and has a wax like appearance on its outer surface
- It lies directly on the earth, under moss or dry leaves
- Pupation occurs in soil



Pupa of Oleander hawk moth

Adult

Robust green hawk moth with yellow markings



Adult Oleander hawk moth (*Daphnis nerii*)

Management of caterpillars

- Collect and destroy the damaged buds and leaves with larvae
- Hand picking, collection and destruction of caterpillars

- Deep summer ploughing to expose the pupae for predation to insectivorous birds
- Spray Spinosad 45 SC @ 167 ml/ha (or) Indoxacarb 14.5 SC @ 517 ml/ha (or) Emamectin benzoate 5 SG @ 220 g
- Two rounds of dusting with Phosalone 4% (or) Malathion 5% @ first 30 days after sowing (DAS) and second at 45 DAS

References

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