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COCONUT RESEARCH INSTITUTE

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LEAF BLIGHT

A Leaf Blight affected young plam

Leaf blight is a disease of the coconut palm. As the name implies, spots appear on leaves, sometimes, so numerous that large patches are formed and leaves appear scorched.

The disease is caused by a fungus infection. There are two fungi associated viz. *Pestalotiopsis palmarum* and *Helminthosporium incurvatum.*

SYMPTOMS

In the initial stages of the disease, the fungus infected spots are visible as small roundish, lesions on the leaf. The centre of each spot or lesion is grey and surrounded by a halo of yellow affected tissue. The lesions enlarge and several of them may coalesce to form a dried up patch. When the infection is heavy the whole leaf may be affected and get dried up. The disease appears heavily on the older leaves.

Seedlings can suffer heavily from this disease, whereas on grown up palms the infection is usually mild. In a severely affected seedling only the bud leaf remains green whilst the other leaves get 'scorched' up or withered.

OCCURANCE, DISTRIBUTION AND DAMAGE

The disease is most pronounced when it appears on seedlings. It is commonly present on tall palms but very mildly. In areas where the climate is generally dry, infection can occur on young palms in the magnitude of an out-break. Such outerbaks occur, frequently, in spells of dry weather, when severely affected young palms suffer loss of healthy foliage to a degree that a set back in their growth is evident. In heavily affected areas, a few palms may die with effects of this disease.

NUTRITIONAL ASPECTS

The condition of leaf blight on palms has been associated with nutritional imbalances. In a manurial trial on young palms the disease broke out in plots that received high levels of nitrogen. It has been observed that palms given heavy dressings of poultry and cattle manure became susceptible to the disease.

ENVIRONMENTAL CONDITIONS

Palms growing under poor conditions easily contact the disease. The blight remains endemic in palms, situated in water logged conditions.

CONTROL

1 Nutritional

To provide resistance to the disease, palms should be given a nutritional treatment for which super phosphate is recommended. The dosage is tabulated below.

Age of palm (Years)	Dosage half yearly in lb.
1 — 2	½
3 — 4	1
5 — 6	2
Over 6	2½

This application is in addition to the normal fertilizing and should be applied till the Leaf Blight condition disappears. All palms in the affected area may be treated.

2. Fungicidal

For quick control, a fungicidal treatment could be considered. The spraying of a copper fungicide is recommended at a dilution of 1-2 per cent. If the blight is heavy, a fortnightly spraying may be necessary for about two months and later a monthly or bimonthly application may suffice. All palms in the affected area should be sprayed as this treatment is a prophylactic measure.

3. Environmental

To control the disease on palms growing under poor environmental conditions it is obviously necessary to improve the situations satisfactorily, and subsequently follow up with the nutritional and fungicidal methods of control.

Copper fungicides are available in Firms dealing with agricultural chemicals. Any one of them can be used at a dilution of 1—2 per cent. The suppliers will advise on rates of dilution in respect of their formulations.