

Research Paper :

# Chemical control of leaf spot disease (*Phaeophleospora indica*) of sapota



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## SUMMARY

An experiment was conducted to find out the effective fungicides for the control of leaf spot disease of sapota at K.R.C. College of Horticulture, Arabhavi. The experimental results revealed that carbendazim (0.1%) effectively controlled the leaf spot disease followed by carbendazim 0.1% followed by mancozeb 0.2%, zineb and propineb 0.2%. With regard to yield, the highest yield as recorded in the treatment of carbendazim (0.1%) followed by carbendazim 0.1% followed by mancozeb 0.2% and propineb 0.2%. The benefit cost ratio was more in the treatment of carbendazim 0.1%.

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## Key words :

Sapota,  
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Sapota [*Manilkara achras* (Mill) Forsberg.] is one of the delicious fruits of humid tropical and subtropical regions. Sapota is evergreen tree with luxuriant growth throughout the year and under most tropical conditions. However, with intensive cultivation of this crop in various states numerous diseases have been reported to cause economic losses to the crop. Leaf spot caused by *Phaeophleospora indica* Chinn. is the most serious disease and was first reported by Chinnappa (1968) and now exists in serious proportion in the states of Karnataka, Tamil Nadu and Maharashtra. Hence, the present investigation was under taken to find out the effective measures for the management of leaf spot disease in sapota.

## MATERIALS AND METHODS

An experiment was conducted during 2001-2008 at K.R.C. College of Horticulture, Arabhavi, UAS, Dharwad. There were nine treatments viz., carbendazim 0.1%, thiophanate methyl 0.1%, mancozeb 0.2%, chlorothalonil 0.2%, copper oxychloride 0.2%, carbendazim 0.1% followed by

mancozeb 0.2%, propineb 0.2% and zineb 0.2% and control. Each treatment was replicated three times in a Randomized Block Design with a spacing of 10 x 10m.

The spraying was done when the disease was observed on few leaves. Two sprays were made at 60 days interval (Thirty days interval in the year 2001-02). Observations were record with respect to leaf spot disease intensity (PDI) and yield.

## RESULTS AND DISCUSSION

The experimental results (Table 1) revealed that two sprays of carbendazim 0.1% at 30 days interval effectively controlled the leaf spot disease (8.28%) followed by chlorothalonil 0.2% (11.49%). The highest PDI was recorded in control (30.75%) during 2001-02. With regards to yield during 2001-02, the highest yield (9.20 kg / plant) was recorded in the treatment of carbendazim 0.1% followed by mancozeb 0.2% followed by mancozeb 0.2% (8.19 kg / plant) and carbendazim 0.1% (7.97 kg /plant) (Table 2). During 2002-2003, the lowest PDI was recorded in the treatment of carbendazim 0.1%

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