

# Pathological Basis of Tikka Leaf Spot Tolerance in Groundnut Cultivars under Hydroponics

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## ABSTRACT

Tikka leaf spot (late) caused by *Phaeoisariopsis personata* has been endemic in major groundnut growing areas of the world. Comparison was made between susceptible (cv. K-6) and tolerant (cv. Kadiri Harithandhra) cultivars grown in hydroponics with respect to pathological basis of infection such as incubation period, latent period, lesion diameter and lesion number on quadrifoliate leaf upon artificial inoculation with conidial suspension @  $1 \times 10^6$  conidia/ml concentration. Incubation period of both the cultivars was 7 days under green house conditions but latent period of Kadiri Harithandhra (17 days) was higher compared to K-6 (14 days). Besides latent period, lesion number and lesion diameter on quadrifoliate leaf were found to be higher in susceptible K-6, *i.e.*, 36 and 3.1 mm respectively when compared to tolerant Kadiri Harithandhra (19 and 1.62 mm). Thus, disease tolerance in cultivar to late tikka leaf spot disease in groundnut was appeared to be governed by reduced number of secondary infection cycles with in crop season due to lesser number of lesions with lesser lesion diameter and higher latent period.

**Key words:** *Groundnut late tikka leaf spot, Incubation period, Latent period, Tolerance, hydroponics.*