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Pathogenic variation among *Fusarium graminearum* isolates and susceptibility of wheat cultivars to seedling blight.

H. R. ETEBARIAN & M. TORABI

Abourayhan Institute of Tehran University and plant pests & Disease Research Institute, Tehran. IRAN.

ABSTRACT

Twelve isolates of *Fusarium graminearum* Schwab obatained from Gorgan, Mazaenaran and Garmsar were employed for pathogenicity tests on wheat cultivars: Khazar, Golestan, Cross-bayat, PR1 and Falat. Inoculated seeds were planted in 30x20x8 cm wooden flats (one isolate/flat). The flats contained autoclaved soil infested with different isolates of the pathogen. The experiment was designed as split plots. Percentage of pre- and postemergence seedling blight, fresh and dry weight of shoots and dry weight of roots were determined and used for the effect of *Fusarium graminearum* on seedling stage.

The results indicted that the isolates 1 and 10 obtained from Behshahre and Gorgan were the most virulent. Percentage of seed germination and dry weight of roots of cultivar Falat was less than those of the other cultivars. The percentage of post-emergence seedling blight in cv. Falat was also greater than those of the others. It was concluded that cv. Falat was the most susceptible cultivar.

It is suggested that for selection of head resistant wheats, the cultivars may be originally evaluated for seedling blight resistance in greenhouse and then the only highly resistant cultivars could be tested in the fueld.

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Address of the authors: Dr. H. R. ETEBARIAN, Abourayhan Institute of Tehran Ubniversity P. O. Box 11365/7117 Tehran. Iran. Dr. M. TORABI. Plant Pests and Disease Research Institute, P. O. Box 19395-1454, Teharn, IRAN.