

Focus

The most common race of wheat stem rust this season is 15-TNM (virulent to Sr 17), isolated in Alabama, Florida, Georgia, Mississippi, Oklahoma, and Texas. Stem rust has also been observed in Arkansas, Illinois, Kansas, and Nebraska. The leading leaf rust races are UN 5 and 17 in Texas and UN 5 and 6 in the Southeast. (Cereal Rust Bull., Rep. No. 5, 11 June 1985)

Harvest index is a helpful selection criterion for wheat grain yield when used in conjunction with nongrain yield and plant height, report H. G. Nass of Agriculture Canada, Charlottetown, P.E.I., and P. Y. Jui of Agriculture Canada, Ottawa, Ont. (Cereal Res. Commun. 13:19-25, 1985)

A plastic culture flask can be modified for direct microscopic observation of fungi, according to J. L. Jarnagin and S. K. Harris of National Veterinary Services Laboratory, USDA, Ames, IA. A hole in the side of the flask is covered with a coverslip and sealed. (Mycopathologia 90:55-58, 1985)

A model to simulate population dynamics of the potato cyst nematode was constructed by S. A. Ward, R. Rabbinge, and H. den Ouden of the Agricultural University and Research Institute for Plant Protection, Wageningen, Netherlands. The model contains two submodels: potato growth and nematode population. (Neth. J. Plant Pathol. 91:27-44, 1985)

The basal regions of corn are more subject to chill stress and therefore to lower chlorophyll content than older (tip) portions of leaves, according to R. Hodgins and R. B. van Huystee of the University of Western Ontario, London. With a temperature change from 12 to 28 C, etiolated seedlings recover. (Can. J. Bot. 63:711-715, 1985)

Meristem-tip culture can be used to eradicate ring-rot bacteria and produce virus-free stocks of potato, according to H. R. Kristensen of the National Institute of Plant Pathology, Lyngby, Denmark. Propagation of the first tuber generation for 2 years is followed by a prebasic system for 3 years. (EPPO Bull. 14[3]:381-387, 1984)

Mulches with reflective surfaces and summer oil sprays can decrease virus incidence in seed cucumbers, reports Z. Basky of the Vegetable Crops Research Institute, Hungary. Reflective mulches repel aphids; blue plastic is more effective than black. (Prot. Ecol. 7:243-248, 1984)

Propagules of vesicular-arbuscular mycorrhizae will not survive in stockpiled topsoil unless the soil water potentials are below, i.e., more negative than, -20 bars, report R. M. Miller, B. A. Carnes, and T. B. Moorman of Argonne National Laboratory in Illinois. Plant hosts and environments are factors also. (J. Appl. Ecol. 22:259-266, 1985)

A test for resistance to blueberry shoestring virus that uses rub inoculation and ELISA was developed by N. L. Schulte, J. F. Hancock, and D. C. Ramsdell of Michigan State University, East Lansing. The virus can be detected most accurately in expanding leaves after dormancy. (J. Am. Soc. Hortic. Sci. 110:347-349, 1985)

A medium selective for Aphanomyces cochlioides from damped-off sugar beet seedlings has been developed by Y. Chikuo and T. Sugimoto of Hokkaido National Agricultural Experiment Station, Sapporo, Japan. Ingredients are cornmeal (20 g), metalaxyl (50 mg), thiophanate-methyl (50 mg), chloramphenicol (50 mg), iprodione (5 mg), and agar (20 g). (Ann. Phytopathol. Soc. Jpn. 51:16-21, 1985)