

Susceptibility of sweetpotato germplasm to rhizopus soft rot caused by *Rhizopus stolonifer* and *Rhizopus oryzae* in Kenya

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Abstract

Susceptibility of fifteen local and introduced sweetpotato germplasm to Rhizopus soft rot disease caused by *Rhizopus stolonifer* and *Rhizopus oryzae* was tested in 1999 and 2000. Roots were surface sterilised, wounded and inoculated with 9 mm diameter agar plugs removed from the edge of actively growing two-day old cultures of the test pathogen. Infection was evaluated by measuring the diameter and depth of the internal lesion developing around the inoculation wound under room temperature for 48 hours. The germplasm exhibited wide variability in susceptibility to infection. The cultivars *Maria Angola*, *Santa Amaro*, SPK 013, KEMB 10 and *Marooko* consistently developed smaller lesions compared to other cultivars, and were considered more resistant to Rhizopus soft rot disease. The cultivars *Naveto*, *Tainung 64*, KEMB 23 and *Yanshu 1* consistently developed larger lesions compared with other cultivars and were considered more susceptible. Variability in susceptibility expressed by the germplasm shows the possibility of using host resistance as a means of controlling Rhizopus soft rot disease in sweetpotato root tubers.