

OCCURRENCE AND DISTRIBUTION OF PLANT PARASITIC NEMATODES IN JASMINE (*JASMINUM GRANDIFLORUM* L.) PLANTATIONS IN EGYPT

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Abstract

Jasmine (*Jasminum grandiflorum* L.), Fam. Oleaceae is one of the most important ornamental plants. An extensive survey conducted during the period from November, 2002 till April, 2003 for the occurrence and distribution of nematodes in major jasmine growing Governorates of Beni-Suief, Giza, Gharbia, Qualiobia and Sharkia in Egypt revealed the presence of fifteen genera of plant parasitic and other nematodes. Absolute and relative population densities (A.P.D. and R.P.D. %), absolute and relative frequencies of occurrence % (A.F.O. %) and R.F.O. %) and prominence values (P.V.) were calculated for each nematode genus. The reniform nematode, *Rotylenchulus reniformis*, spiral nematode, *Helicotylenchus* spp., stunt nematode, *Tylenchorhynchus* spp., and root-knot nematode, *Meloidogyne* spp., are the major nematode pests on jasmine and occurring by 98 %, 54 %, 53.8 % and 40 %, respectively. A.P.D., R.P.D. %, A.F.O. % R.F.O. % AND P.V. of these four nematodes were consistently higher than those of the other nematodes. The presence of these genera in relative abundance suggests that they may be of potential significances as pests of jasmine. Occurrence and densities of the surveyed nematodes associated with jasmine plantations are recorded in relation to different villages.