Population dynamic of the black scale insect, *Chrysomphalus aonidium* Ashmead infesting the ornamental plant, *Hedra helix* under Assiut governorate

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*Hedra helix* is an ornamental plant which consider a host of the circular black scale insect, *Chrysomphalus aonidium* (= *ficus*). The present work was conducted in the Experimental Station of the Faculty of Agriculture, Assiut University during the two successive seasons, 2008/2009 and 2009/2010. Results of both seasons clearly indicated that the pest population was high during the period from December to April. At this period, 68.92 and 73.38% of the pest population were recorded during the 1st and 2nd seasons, respectively. The highest percentage of the pest population was recorded during February of the 1st season (15.96%) and during April of the 2nd one (16.16%). The period from June to September had the lowest percentages (6.16 and 2.34%) of the pest population during both seasons, respectively. August had the lowest population during both seasons. The pest has four generations in each season. September was the favorable month for the pest population growth and build up, since the highest monthly variation rate (M.V.R.) was achieved. The effects of some biotic and abiotic factors on the insect population were also studied. Only one parasitoid species, *Aphytis linganensis* Compere was recorded during both seasons. The seasonal abundance, percentages of parasitism and the effect of some weather factors on its population were determined.

Biography

Abou-Elhagag G H is the professor and head of Department of plant protection, Faculty of Agriculture, Assiut University, Egypt. He completed his PhD in Plant Protection (Economic Entomology), Faculty of Agriculture, Assiut University (1995). He has published more than 30 research papers and supervised two doctoral theses.

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