EVALUATION OF THE PESTICIDES EFFICACY FOR THE CONTROL OF TWO PSEUDOCOCCIDAE SPECIES INFESTING AVOCADO TREES *Persea americana* Mill.) IN CHILE

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The efficacy of six pesticides was evaluated on two species of mealybugs that infest avocado: *Pseudococcus calceolariae* and *P. longispinus*. The trial was carried out in the Quillota province, Chile, in April 2005. The following products were applied to the foliage: thiamethoxam (Actara 25 WG), chlorpyrifos (Lorsban 4E), mineral oil (Citroliv miscible), imidacloprid (Confidor Forte 200 SL), buprofezin (Applaud 25 WP) and methomyl (Lannate 90) and a control was maintained with no spraying. Each treatment was replicated 4 times and mealybugs evaluated in 5 occasions, 1 previous and 4 post-spraying. The presence of mealybugs was registered in shoots and fruits, and the density of the pest and its natural enemies in corrugated cardboard traps. The products thiamethoxam, imidacloprid, chlorpyrifos and methomyl controlled effectively the pest maintaining over 75 and 93% of mortality on shoots and fruits respectively, based on the unsprayed control, during 60 days. Buprofezin, showed a gradual reduction of the pest density contrasting with the high initial effect of methomyl, increasing thereafter, especially on shoots. The mineral oil showed an effective control of the pest in fruits, similar to neonicotinoides (thiamethoxam and imidacloprid); however, it was ineffective on new growth, such as shoots, where the density of the pest increased to similar levels as on trees with no spraying. A low density of predators and parasitoids were registered on the cardboard traps showing no differences between treatments.